

The Determinants and Impact of Inward oil and gas FDI in Nigeria

By

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Wolverhampton for the degree of Doctor of Philosophy

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Abstract

Endowed with enormous natural resources but with a volatile economy, this study seeks to conduct an empirical analysis investigating the determinants and impact of inward oil and gas FDI on Nigeria's economic growth and export performance. The study dataset covers a period of 17 years from 2001 to 2017. The country-level dataset was analysed in three separate models, which include, the country as a whole, OECD group and non-OECD group using dynamic panel data analysis techniques proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment). The study's empirical evidence provides statistical support that inward oil and gas FDI in Nigeria is determined by market-seeking (proxied by GDP per capita), resource-seeking (proxied by fuel export) and efficiency-seeking (proxied by labour force). As a whole, it is seen that OECD countries' FDI is more attracted by market-seeking and efficiency-seeking determinants, while, non-OECD countries are more attracted by resource-seeking factors. The study also found that inward oil and gas FDI in Nigeria has a significant positive effect on economic growth (proxied by GDP per capita). However, the study shows that OECD countries oil and gas FDI impact on Nigeria's economic growth is higher compared to non-OECD countries oil and gas FDI. As regards export performance, the empirical results showed that inward oil and gas FDI in Nigeria has a significant positive effect on export performance in Nigeria (proxied by oil and gas exports). Also, from the empirical results, it is observed that the impact of non-OECD countries' oil and gas FDI is higher compared to OECD countries oil and gas FDI impact on Nigeria's foreign export. The empirical results corroborate the complementarity hypothesis of FDI and trade nexus by providing empirical evidence using oil and gas FDI in Nigeria. The main theoretical contributions of this study stem from the empirical evidence on inward oil and gas FDI examining the heterogeneity of the investing MNEs and, showing how this heterogeneity of investing MNEs impact on Nigeria's economic growth and export performance. The study also provides valid evidence for FDI promotion agencies in Nigeria on how best to harness the benefits of inward oil and gas FDI in a volatile economy for greater economic and export performance.

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Acronyms

CBN – Central Bank of Nigeria
CIA - Central Intelligence Agency
EITI - Extractive Industries Transparency Initiative
EM FDI -Emerging Market Foreign Direct Investment
EM MNEs – Emerging Market Multinational Enterprises
FDI- Foreign Direct Investment
FSAs - Firm Specific Advantages
GDP - Gross Domestic Product
IB - International Business
LDCs - Less Developed Countries
MDGs - Millennium Development Goals
MNCs – Multinational Corporations
MNEs - Multinational Enterprises
NBS - Nigerian Bureau of Statistics
NEEDS - National Economic Empowerment and Development Strategy
NEPAD - New Partnership for Africa’s Development
NIPC - Nigerian Investment Promotion Commission
NIPC - Nigerian Investment Promotion Commission
NNPC - Nigerian National Petroleum Company
OECD - Organisation for Economic Co-operation and Development
NSE - Nigerian Stock Exchange
OGFDI - Oil And Gas FDI
OLI – Ownership Locational Internalisation
OPEC - Organization of Petroleum Exporting Countries
PIB - Petroleum Industry Bill
RBT/V - Resource-Based Theory/View
SAP - Structural Adjustment Programme
SSA - Sub-Sahara Africa
sys-GMM - System Generalized-Method-of-Moment
TEX - Total Export
UAE - United Arab Emirates
UNCTAD - United Nations Conference on Trade and Development
WHO - World Health Organization
WIR – World Investment Report

1.0 Introduction

1.1 Background of the Study

The past few years have seen a tremendous growth of foreign direct investment (FDI) that has exceeded both world output and world trade. In developing countries and transition economies, FDI has been considered vital for economic growth and prosperity (Çevis and Burak, 2009). This further explains the de facto convergence of government policies across economies (both in developing and developed countries) to attract FDI by easing the operations of multinational enterprises (MNEs) (UNCTAD, 1994). For developing countries, FDI is viewed as a less volatile source of funding in the wake of the debt crisis and constraint in public funds (Chuhan et al., 1996). Many countries have encouraged FDI as an essential element in their strategy for economic development (Asiedu, 2002; Moses, 2011). As noted in Moses (2011) and World Bank (1996), FDI is made to acquire a lasting management interest in a firm that operates in a country other than that of the investor (usually benchmarked at 10% of voting stock).

Furthermore, the preference for FDI compared to other forms of foreign investments is associated to the new technology, marketing and managerial competencies it brings into the host location (Sjoholm, 1999; Obwona, 2004). In the case of developing countries, attracting FDI has often been skewed towards extractive industries and/or natural resources (Asiedu, 2002; Ayanwale, 2007). FDI is said to play an essential role in the economic development of any country. FDI can complement domestic investment and facilitate international trade (Li and Liu, 2005). International business (IB) scholars are very much interested in the determinants of FDI in developing countries with a view to understanding relevant drivers, and thus, re-align FDI theories which are mainly formed from the experiences of FDI in developed economies (Sjoholm, 1999; Obwona, 2004; Luo and Wang, 2012).

A wide variety of location-specific factors have been identified behind FDI. IB scholars have argued that these factors are conditioned by the home or host locational factors of the investing firm (Luo and Wang, 2012). IB scholars have also noted that the determinants of FDI may also be influenced by the MNEs' strategic ownership advantage, motives, location choice and choice of entry mode (Luo and Tung, 2007; Luo and Wang, 2012).

For a country like Nigeria, FDI inflow is essential to develop a robust framework for measuring and analysing the developmental growth of the country. Nigeria as a developing country, is blessed with immense natural resources, such as deposits of solid mineral, crude oil and gas. Nigeria's importance to Africa as a continent cannot be overemphasised because as at 2012, Nigeria had a population of 182 million which is about 25% of the African population, with an annual growth rate of 5.3%. The Nigerian economy is the 2nd largest in Sub-Sahara Africa (SSA) after South Africa (Ojewale and Appiah-Nyamekye, 2018). Given the natural resource base and large market size, Nigeria qualifies as a major recipient of FDI in Africa and is one of the top three leading African countries that consistently received FDI. The other two countries are South Africa and Angola (Imoudu, 2012). In 2015 Nigeria accounted for 78% of FDI inflows and 64% of FDI stock in West Africa sub-region (UNCTAD, 2016). Despite this, development and economic growth have been more or less modest when compared with other African economies with similar economic history on FDI.

As a whole, the SSA countries lag behind other regions in attracting FDI, compared to the increased flow of investment into developing countries (Osinubi and Amaghionye-diwe, 2010). The uneven dispersion of FDI between regions in developing countries is a cause of concern since FDI is an important source of growth (Osinubi and Amaghionye-diwe, 2010). The beneficial effect of FDI is that it adds to investment resources, capital formation and also contributes to technological development with tendencies for positive spillover effects (Osinubi and Amaghionye-diwe, 2010; Ojewale and Appiah-Nyamekye, 2018). Positive

spillovers include transfers of innovative capacity, production technology, and managerial practices (Osinubi and Amaghionyeiwe, 2010). Given this vital role of FDI in developing countries, several studies on the determinants of FDI inflows into developing economies have largely employed aggregate FDI data with little attention on other aspects of value-adding operations of firms such as FDI in oil and gas (Akinlo, 2004; Ayanwale, 2007; Osinubi and Amaghionyeiwe, 2010; Imoudu, 2012). Although these studies provide valuable insights, for instance, Ayanwale (2007) revealed that FDI in Nigeria is determined by market size, stable macroeconomic policy, and infrastructure development. Osinubi and Amaghionyeiwe (2010) documented that the exchange rate significantly influences inward FDI in Nigeria. A similar study by Imoudu (2012) employed Johansen Cointegration data analysis techniques, on the impact of disaggregated FDI (i.e. FDI into Nigeria's agriculture, mining, manufacturing, telecom and petroleum sectors) on Nigeria's economic growth, showed that with the exception of telecom sector, FDI into the other sectors positively influenced economic growth in Nigeria in the long-run.

Extending this line of research, this study seeks to investigate the determinants of FDI into the oil and gas sector of Nigeria and its impact on economic growth and export performance. The study employs a dynamic panel data analysis proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment) not used by previous studies in case of Nigeria on a recent set of data covering a period of 17 years from 2001 to 2017. Unlike previous studies, this study will consider the heterogeneity between investing MNEs grouped into OECD and non-OECD countries, in examining the determinants of FDI into the oil and gas sector of Nigeria and its impact on economic growth and export performance. Hence, the study is motivated by three main research questions:

1. What are the determinants of oil and gas FDI in Nigeria, and that from OECD and non-OECD home countries into Nigeria?

2. What is the impact of oil and gas FDI in Nigeria, and that from OECD and non-OECD home countries, on Nigeria's economic growth?
3. What is the impact of oil and gas FDI in Nigeria, and that from OECD and non-OECD home countries, on Nigeria's export?

1.2 Rationale of the Study/Research Gap

UNCTAD (2016) report shows that investors over the years had targeted key sectors such as; oil and gas, real estate, communications, and consumer goods sectors of the Nigerian economy. This corroborates with prior empirical FDI studies on developing countries (including developing African countries) which revealed that FDI is largely influenced by natural resource endowments (Asiedu, 2002; Chakrabarti, 2001; Frenkel et al., 2004; Nunes and Oscategui, 2006; Asiedu, 2006). In 2007, the oil and gas sector accounts for 90% of Nigeria GDP (Anyanwu, 2012). However, little is known on the determinants of oil and gas FDI in Nigeria. Prior empirical studies on determinants of FDI in Nigeria have focused on other sectors and not on oil and gas (for example, Udoh and Egwaikhide, 2008; Dauda and Stein, 2007; Dauda, 2009; Wafure and Nurudeen, 2010; Anyanwu, 2012). Nigeria's economy is one which has been and continues to be dominated by the oil sector. Structural reforms pursued by policy-makers have been to promote more FDI as well as diversifying the economy for sustained economic growth outside oil (Akinlo, 2004; Ayanwale, 2007). Exploration activities have been minimal and largely disrupted due to security and social vices like: militancy in the Niger Delta region; oil bunkering; vandalisation of installations, coupled with high cost of oil production and declining oil prices; and more recently terrorist attacks in the North-Eastern region particularly in new oil fields facilities (Odigbo, 2013, Ewetan and Ese, 2014).

Past studies in determinants of resource-seeking FDI have shown that the availability of vast natural resources does not necessarily translate into economic growth or prosperity (Auty 1993; Sachs and Warner 2001). This is contrary to the view that endowment of natural resources in

any country is an important source of national wealth that enhances economic growth (Oyejide and Adewuyi, 2011). Relating this to Nigeria, it will be expected that the abundance of natural resources will attract resource-seeking FDI which in turn promotes a long-term economic growth, but Nigeria is still yet to achieve such sustained economic growth (Ewetan and Ese, 2014).

For instance, Auty (2001) and Sachs and Warner (2001) revealed that resource-seeking FDI in resource abundant countries in Africa underperform and have less prosperity or economic growth when compared to countries without resources. Auty (2001) described the negative relationship between a nation's output and prosperity and natural resource abundance as natural resource-curse. This natural resource curse is also known as 'the paradox of plenty'. Sachs and Warner (2001) building upon the basic assumptions of rentier state theory, claimed that resource wealth is linked to poor economic growth and other economic problems such as Dutch disease effects and poor performance of the agricultural and manufacturing sectors accompanied by an insufficient degree of diversification and extreme vulnerability towards external shocks.

Some other studies have associated the resource curse by linking natural resources to violent conflicts (de Soysa 2000; Le Billon 2001). Chong-Sup Kim and Yeon-silkim (2008) found a negative relationship between Natural Resource Abundance and Economic Growth in Latin America. Gylfason and Zoega (2001) in a study of 85 countries from 1986 to 1988, FDI in natural resources crowd out human capital, thereby inhibiting economic growth. Sala-i-Martin and Subramanian (2003) showed that there would be a slowdown of the development of the financial system to support economic growth due to heavy dependence on natural resources wealth.

A number of studies have examined the effects of FDI on growth in developing countries (de Soysa 2000; Le Billon 2001; Chong-Sup Kim and Yeon-silkim, 2008). Though these studies

have made useful contributions towards an understanding of the role of FDI in economic growth, their statistical approach raises critical methodological and theoretical issues (Oladipo, 2010). First, many of the investigations examining FDI - growth nexus in developing countries - pay little consideration to the heterogeneity of investing MNEs (Dimowo and Edo, 1996; Akinlo, 2004). Second, the issue of endogeneity between FDI growth have not been fully addressed (Oladipo, 2010).

Blomstrom et al. (1994), in a cross-country analysis of 78 developing countries, also found that FDI had a positive effect on growth rates for higher-income developing countries, but not for lower-income ones. Borensztein et al. (1998), and De Mello (1999), by utilizing a sample of OECD and non-OECD countries over the period 1970-90, conclude that the long-term growth in host countries is determined by the spillovers of technology and knowledge from the investing countries to host countries, and its extent is determined by the complementary and substitution of FDI and domestic investment. In the non-OECD sample, he demonstrated no causation from FDI to growth based on fixed-effects regressions and a negative short-run impact of FDI on GDP, indicating that growth benefits may be restricted to higher-income countries.

These mixed findings, therefore, suggest that there is no consensus on how natural resource-seeking FDI affects economic growth. This study investigates the impact of FDI in oil and gas sector on economic growth in Nigeria. Also, the study identifies other important factors drawing on the endogenous growth theory to explain the impact of FDI in oil and gas sector on economic growth in Nigeria. Furthermore, Nigeria's overdependence on the oil and gas sector has remained a problem for the Nigerian government on the need for the government to engage in the diversification of the Nigerian economy. Examining the motivations for direct investment in Nigeria and the extent to which FDI contributes to growth, the study seeks to shed light on appropriate policies to pursue in order to encourage higher volumes of FDI and

their likely implications for economic growth and export performance. The growing importance of FDI in Nigeria's economy through the oil and gas industry creates much interest for this research. This will be achieved through the following three objectives:

1. To investigate the determinants of oil and gas FDI in Nigeria, and compare between OECD and non-OECD home countries FDI in Nigeria.
2. To investigate the impact of oil and gas FDI in Nigeria, and that from OECD and non-OECD home countries on Nigeria's economic growth.
3. To investigate the impact of oil and gas FDI in Nigeria, and that from OECD and non-OECD home countries FDI in Nigeria on Nigeria's export.

1.3 Research Outline and Methods

This research investigates the determinants of FDI and the impact on UK economic growth and export performance. The first aspect of this research provides empirical evidence on the determinants of FDI. To address research question 1, the study hypotheses H_1 , H_2 , and H_3 were developed in Chapter 3 consistent with Dunning's model (Dunning, 1988, 2001). Building on this model, this study examines how the determinants may differ between OECD vs non-OECD countries given their heterogeneity in economic and technological capabilities (Von Zedtwitz and Gassmann, 2002, Fallon and Cook, 2010, 2014). To test this, H_{1a} , H_{1b} , H_{2a} , H_{2b} , H_{3a} and H_{3b} are also developed in Chapter 3.

After examining the determinants of FDI, the second aspect of this research will focus on the second research question of this study. Here, the study draws support from the framework of FDI-based endogenous growth model of economic growth (Borensztein et al., 1998; De Mello, 1999). In Chapter 4, research hypotheses H_4 , H_{4a} , H_{4b} are developed to examine the impact of FDI on economic growth and how the impact may differ between OECD vs non-OECD countries given their heterogeneity in economic and technological capabilities (Dimowo and Edo, 1996; Akinlo, 2004). However, consistent with the literature that suggests that FDI impact

on economic growth is conditional on other factors between the host location and the investing MNEs. The research also developed H₅, H₆, H₇, and H₈.

After the empirical work done for FDI-growth nexus, FDI impact on export performance will become the next focus to constitute the third part of this research. In Chapter 5, drawing support from prior studies, hypothesis H₉ was developed to examine the complementarity or substitutability model of FDI-export performance nexus. Furthermore, scholarly research on FDI - export nexus have also shown that FDI could have either a complementarity or substitutability effect on international trade depending on the economic and technological capabilities of the host country and its trading partners (Greenway et al., 2004; Kneller and Pisu, 2007). Given this heterogeneity, hypotheses H_{9a} and H_{9b} were developed to examine the magnitude of the impact of FDI on export by home countries investing in Nigeria grouped into OECD and non-OECD countries.

In order to validate existing theories of which the study hypotheses are developed to address the study research questions, the research draws its research theoretical and philosophical assumptions from the positivist, quantitative and deductive research approach (Burrell and Morgan, 2016). Deductive research employs quantitative data to test for causal relationships to either accept or reject a hypothesis (Creswell and Creswell, 2017). The study dataset covers a period of 17 years from 2001 to 2017 making a total of 306 observations. The country-level dataset would be analysed in three models: 1) the country as a whole; 2) OECD group and 3) non-OECD group. The OECD countries group is made up of 204 observations and non-OECD countries group is made up of 102 observations. The study dataset was analysed using dynamic panel data analysis proposed by Blundell and Bond (1998) known in methodology literature as system Generalized-Method-of-Moment (sys-GMM). The study proxied for oil and gas FDI in Nigeria using FDI capital expenditures by foreign MNEs in Nigeria oil and gas industry obtained from the Central Bank of Nigeria. The data for oil and gas FDI for all three sectors:

the downstream sector, midstream sector and upstream sector, is published by Nigeria Bureau of Statistics and Central Bank of Nigeria. The choice for FDI capital expenditure was due to the lack of availability for other potential proxies, like, project count variable or job data. Also, FDI capital expenditure happens to be widely used in FDI empirical studies, see (Obwona, 2001; Kyereboah-Coleman and Agyire-Tettey, 2008; Udoh and Egwaikhide, 2008; Dauda, 2009; Wafure and Nurudeen, 2010). The choice of panel data is that it captures variation in cross-section and overtime of observed units (Greene, 1997; Wooldridge, 2010; William, 2013). Panel data allows the use of much richer models and estimation methods. The use of sys-GMM enables the explanatory variables to be treated as potentially endogenous or exogenous. This is potentially important for IB research, as it is better suited than standard models for determining coefficients for time-invariant variables.

1.4 Thesis Structure

This research investigates the determinants and impact of oil and gas FDI in Nigeria. This thesis is structured into ten chapters. Following the introduction, Chapter Two describes the research context of Nigeria oil and gas and trends analysis of inward FDI in Nigeria. Chapter Three contains the literature review on the theories of FDI, conceptual framework and hypothesis development. Chapter Four contains a literature review on the theories of FDI impact on economic growth, and the study conceptual framework and hypothesis development on oil and gas FDI and economic growth nexus. Chapter Five contains a literature review on the theories of FDI impact on export, and the study conceptual framework and hypothesis development on oil and gas FDI and export nexus. Chapter Six focuses on the research data and methodology. Chapter Seven contains analysis and discussion of the determinants of oil and gas FDI in Nigeria. Chapter Eight contains analysis and discussion on the impact of oil and gas FDI on Nigeria's economic growth. Chapter Nine contains analysis and discussion on the impact of oil and gas FDI on Nigeria's exports. Chapter Ten contains a conclusion, summarising the key

empirical findings, and the study's contributions to knowledge and practice, notes the research limitations and recommendations for future research.

2.0 Chapter Two: FDI Trends in Nigeria

2.1 Introduction

This chapter provides an overview of Nigeria's economic landscape and a review of general FDI trends and patterns as well as oil and gas FDI into Nigeria. The purpose of this review is to establish the relevance of oil and gas FDI to the Nigerian economy and how the economy has performed over the years post-independence. This chapter is thus organised into four main sections. Section one introduces the chapter. Section two provides an overview of FDI trends in Nigeria, focusing on both FDI stock and FDI inflow as well as the source countries investing in Nigeria. Section three reviews oil and gas FDI into Nigeria as well as the source countries. Section four provides an overview of Nigeria's economic landscape.

2.2 Overview of FDI Trends in Nigeria

Foreign direct investment (FDI) is an investment made to acquire a lasting management interest (usually 10% of voting stock) in a business enterprise operating in a country other than that of the investor (World Bank, 1996). Many countries encourage FDI as an important element in their strategy for economic development (Asiedu, 2002; Moses, 2011). The preference for FDI is largely associated not only with the foreign capital it brings to the host location, but also, FDI comes along with new technology, marketing and managerial competencies into the host location (Sjoholm, 1999; Obwona, 2004). FDI is said to play an important role in the economic development of any country (Asiedu, 2002). FDI complements domestic investment and facilitates international trade (Li and Liu, 2005). The efforts of most countries in Africa to attract FDI have often been skewed towards extractive industries/natural resources (Asiedu, 2002). Nigeria as a country, given her natural resource base and large market size, thus, qualifies to be a major recipient of FDI into Africa, and indeed, Nigeria is one of the top three

leading African countries that consistently received FDI (the other two countries are South Africa and Angola).

Insert Figures 1 and 2 here

FDI stock in Nigeria has maintained a steady increase over the last 35 years from \$2.5billion in the 1980s to \$97billion in 2017. FDI inflows on the other hand, have increasingly remained stable over the same period (see Figure 1). For example, FDI inflows from a high of \$8.9billion in 2011 to a low of \$3.5billion in 2017. In Figure 2, the trendline of FDI Inflow as a percentage of GDP shows that FDI inflow into Nigeria has been on a downward trend. These results are a true reflection of the situation regarding the economic, social, legal and cultural environment in Nigeria and the level of insecurity and political instability in recent times (Bakar and Afolabi, 2017). Some other authors like Adam and Opoku (2017) attributed the declining FDI inflows to the surge of FDI to other oil-rich countries, such as Angola and Sudan. Also, other large and stable African countries such as Egypt and South Africa which have managed to diversify their economy and successful in attracting FDI in various sectors of their economies.

Insert Table 1a, 1b and 1c here

From Table 1a, in 1996 Nigeria accounted for about 20% of FDI stock in Africa and 70% of FDI stock in West Africa Sub Region, but as at 2017, these statistics have dropped to 11.27% of FDI stock in Africa and 54.51% of FDI stock in West Africa Sub Region respectively. However, the yearly average growth is found to be 12.72% and 62.17%, respectively. In terms of FDI inflow, in 1996, Nigeria accounted for about 36.28% of FDI stock in Africa and 83.77% of FDI stock in West Africa Sub Region. While, in 2017, FDI inflow to Nigeria decreased to 8.36% of total FDI inflow to Africa and 31.91% of FDI inflow in West Africa Sub Region. This corroborates with the earlier observation that FDI stock has steadily increased over the year, whilst, FDI inflows remained stable.

With inter alia recommendation that countries involved in exporting petroleum should channel FDI inflows to nonoil sectors to make those sectors viable as well as augment their productive bases. Successive Nigerian governments have focused on primarily reducing the country's overdependence on the oil and gas sector as well as the formulation of strategies and programmes that will boost its structural adjustment programme (SAP) as well as sustain its achievements over time. Such programmes are the National Economic Empowerment and Development Strategy (NEEDS) of the President Olusegun Obasanjo government in 2004, The Seven-Point Agenda of President Umaru Yar'Adua government in 2007, the Transformation Agenda of President Goodluck Jonathan government in 2011 and the War on Corruption and Impunity programmes by the President Muhammadu Buhari government in 2015. The structural adjustment programme (SAP) of 1986 placed importance and emphasis on a shift from the oil and gas sector to the non-oil and gas sector as a way of reducing Nigeria's overdependence on the oil and gas sector via diversification of the economy. The SAP was primarily aimed at returning to the agricultural sector, which hitherto, was the main revenue generator for the country prior to the discovery of oil in Nigeria. By 1970, the agricultural sector had contributed over 70 percent to the country's GDP (Olayiwola and Okodua, 2013).

Today, forty-seven years after the introduction of SAP in Nigeria, the economy is still reliant on the oil and gas sector. The global decline and changes in the international prices of oil and gas commodities have to date continued to subject the Nigerian economy to external shocks which create structural dislocation in the country's economy. This continuous decline in the international oil and gas commodity prices has plunged the Nigerian economy into a recession at the first quarter of 2016 (NBS,2016) thereby forcing the government of Nigeria to adopt austerity measures which in turn brought about economic hardship on majority of Nigerians by affecting their living standards.

Interestingly, there is an increasing demand in renewable sources of energy such as fracking which ultimately poses a global threat to the economies of oil and gas exporting countries of a sharp decline in oil and gas commodity prices as well as an imminent international oil and gas market failure. This leaves the Nigerian economy with the Hobson's choice of reducing overdependence on oil. A shift in emphasis on trade from oil export to non-oil export will free up oil-exporting countries from the vicissitudes of international oil price volatility but most importantly to lead to the diversification of revenue bases. Magazzino (2016) pointed out the importance and implication of the sensitivity of economic growth to carbon dioxide emissions while deciding on the preferred choice of alternative sources of energy. Globally, countries need to adopt measures of clean energy from renewable energy sources to protect the environment from global warming and minimize carbon dioxide emissions (Mehrara, 2007). The need for a diversified economy has further been reinforced due to the increase demand for electric cars and use of solar panels, and most recently, countries in the Middle East and in Africa are faced with both the coronavirus pandemic (COVID-19) and a collapse in oil prices (Arezki and Nguyen, 2020).

The law that governs and regulates FDI policies in Nigeria is the Nigerian Investment Promotion Commission Act No 16 of 1995 (NIPC Act); the Nigerian Investment Promotion Commission (NIPC) is the body that regulates the policies. The NIPC has policies regarding the two main operational sectors of the oil and gas industry in Nigeria. These operational sectors are the upstream and downstream operations. Although more fundamental issues like market size, access to raw materials, the safety of investors and their investments and the availability of skilled labour are important factors that attract FDI, most developing countries seem to lean towards tax incentives. However, the interconnection of the tax policies of some host states with those of the home states of some foreign investors has further increased the reliance of some countries on tax incentives. However, some home countries have tax policies

that do not necessarily make tax incentive attractive to their investors; for example, the change in the US tax policy in the 1980s affected US foreign investors and the effectiveness of the tax policies in the host states in which they had investments since mid-1980s.

The importance of FDI in eradicating poverty was echoed in the new partnership for Africa's Development (NEPAD) declaration. In the declaration, it was suggested that, for the African continent to achieve the millennium development goals (MDGs), Africa needs to fill an annual resource gap of US\$64 billion, about 12% of gross domestic product (GDP) (Asante, 2007). Since income levels and domestic savings in the region are low, the bulk of the resources needed would have to come from abroad. That is from official sources (finance from multilateral organizations such as the World Bank and international monetary fund), foreign indirect investment (which includes portfolio investments, bond finance and bank lending). However, the inflow of official assistance into Sub-Saharan Africa has been declining due to the global economic meltdown. In addition, foreign indirect investment is unavailable to most African countries since most countries in this region are incapable of raising funds from international capital markets (World Bank, 2009). Consequently, the bulk of the external resources needed for socio-economic development are derived from FDI.

Despite the numerous programmes and strategies adopted by the Federal Government of Nigeria to realize an increase in the contribution of the non-oil sector to the Federal Inland Revenue Service (FIRS), the earnings have not increased substantially over the years. The table below explains this situation. This has resulted in the continuing dominance of the oil sector in the Nigerian economy and the inevitable heavy reliance of the country on oil.

Insert Tables 2 and 3 here

Tables 2 and 3, which present data on FDI inflows published by the CBN coupled with other sources showed that the Netherlands, UK and the US are the major home countries investing

in Nigeria either in terms of FDI inflows or FDI stock (in terms of general FDI). As of 2003, in Table 2, the Netherlands has the highest inflow of FDI investing about US\$317 million, followed by the US investing about US\$179 million, and the UK US\$27 million worth of FDI inflow. In terms of FDI stock (as presented in Table 3), in 1990, the Netherlands FDI stock in Nigeria was \$44million, UK was \$627million and the US \$401million. However, in 2003 the Netherlands takes the first position with FDI stock in Nigeria amounted to \$3.1 billion, the UK in the second position with FDI stock amounted to \$1.8 billion and the US in the third position amounted \$1.1billion of FDI stock in Nigeria constituting an increase of 98%, 65% and 64% respectively.

2.3 Oil and Gas FDI into Nigeria

Insert Figures 3 and 4 here

As earlier noted, like other African countries, FDI flows into Nigeria are directed to its natural endowments. As depicted in Figure 3, it is observed that OGFDI (oil and gas FDI) into Nigeria follows a similar pattern as general FDI inflows. It is also observed that in 2015 OGFDI inflows account for over 65% of general FDI inflows. But this dropped to 32% in 2017. Figure 4 shows that the top four source countries investing in Nigeria are France, the United States, China and Russia. This goes to show that Nigeria attracts FDIs across heterogeneous countries with different economic and technological capabilities. For example, in Table 4 it can be observed that the majority of the countries that invest in Nigeria's Oil and Gas sector are also active players in attracting FDI to their respective countries.

Insert Tables 4 and 5 here

The oil and gas have been the mainstay of the Nigerian economy and have played a vital role in shaping the economic and political landscape of the country. Crude oil was first discovered

in Nigeria in 1956 (Odularu, 2008). Nigeria joined the ranks of oil producers in 1958 producing 5,100 bpd (barrels per day) (Odularu, 2008) and later in 1971 joined the Organization of Petroleum Exporting Countries (OPEC) and established the Nigerian National Petroleum Company (NNPC) a state-owned company which is a major player in the upstream, midstream and downstream sectors (Odularu, 2008). Nigeria's proven oil reserves are estimated to be 35 billion barrels; natural gas reserves are well over 100 trillion fti (2,800 kmi) (Odularu, 2008). Petroleum production and export play a dominant role in Nigeria's economy and account for over 90 % of gross earnings from exports (as depicted in Table 5). Thus, over-reliance on revenues from natural resources could lead to the concurrent decline in other sectors in the economy, having mono-economic model could lead to lesser economic development and growth (Lawal *et al.*, 2011; Uzonwanne, 2015).

Also, the failure on part of the Nigerian government not to diversify the economy which is heavily dependent on oil and gas has brought the country to an economic recession given that economic performance is closely predicted by the international oil prices determined by the Organization of petroleum exporting countries (OPEC) as well as other attendant vagaries linked to the oil and gas industry. The Nigerian economy is faced with serious disrepair in critical infrastructural facilities such as power and energy, roads and technological infrastructure, the economy though developing is characterized by high rates of unemployment, widespread poverty, the persistent balance of payment inequality, rising inflation, underutilisation of productive capacity and income inequality.

The Nigerian government has stated that with the decline in crude oil prices beginning from 2008, there is need for alternative sources of development financing and for the economy to be diversified to augment domestic savings by encouraging the inflow of FDI which in turn would result to various improvements in employment, technology, balance of payments, foreign exchange earnings and also decrease in import bills. The Nigerian government put in place

several policies as incentives for attracting foreign investments, these fiscal /monetary policies are articulated in annual budgets and strategic plans which aims to control indicators like unemployment, aggregate spending, interest rates, exchange rates, inflation, deficit spending and GDP growth rate (NIPC, 2009). Recent data by Nigeria's National Bureau of Statistics showed that besides foreign portfolio inflows (in equities, stocks, and bonds), Nigeria recorded no direct capital investment inflow in the third quarter of 2016. This is a dramatic fall from the high reported in 2014 for a country that has been a major recipient of FDI in Africa. UNCTAD (2016) reported that Nigeria's FDI fell 34 percent from \$4.7 billion in 2014 to \$3.1 billion in 2015. The Nigerian oil and gas sector has accumulated over the past five years a huge debt of over \$6bn (NIPC, 2015).

2.4 Nigeria Economic Landscape

Insert Figure 5 here

The Nigeria economy is characterised as a mono-product economy which depends largely on the commercial exploration of oil and gas (Ijeoma *et al.*, 2018). Although, Nigeria is also known to be endowed with other mineral resources such: bitumen, coal, topaz, limestone, marble, lead gold, ruby, gemstone, uranium, iron ore (Chinago, *et al*, 2015), oil exploration has been the main revenue-generating sector for the Nigerian government (Uzonwanne, 2015). This phenomenon could be traced to the early 1970s, particularly the Arab-Israel war which caused the oil price boom in the global market as a result of oil-producing Arab states boycotted Western states for their support to Israel during the war (Esekumemu, 2016). As depicted in Figure 5, between 1970 to 1980 Nigeria GDP per capita grew to a new high post-independence at 659.87 US dollars in 1980. However, in the next two decades that followed the GDP per capita decreased downwards at 299.35 US dollars in 1999. Between 2000 to 2014, the GDP per capita increased more than 700 percent to a new high at 3080.31 US dollars in 2014 except

in 2008-2010 due to the global financial meltdown (Porter and Watts, 2017). However, from 2014 to 2017 Nigeria's GDP per capita decreased downwards caused by declining world oil prices which has made the economy plunged into another recession. The cause of the recession has also been linked to the USA not purchasing crude oil from Nigeria since 2014 due to the discovery of shale oil and natural gas in commercial quantity which serves as a better substitute for Nigeria's crude oil since it is cheaper (Esekumemu, 2016).

Insert Figure 6 and 7 here

The mono-product economy (i.e. oil driving economy) has caused other sectors to collapse that once created wealth, employment and productivity (Uzonwanne, 2015). Recent data by the Nigerian Bureau of Statistics (NBS) shows that Nigeria emerged from recession with a GDP growth rate of 0.8 percent in 2017 and 1.9 percent in 2018 (see Figure 6), this growth is still driven mainly by the oil sector (Ijeoma *et al.*, 2018). Socio-economic progress achieved in 2017 and 2018 still fell below the population growth rate. As depicted in Figure 7, whilst, GDP growth rate of 0.8 percent in 2017 and 1.9 percent in 2018 in Figure 6, the population growth rate stood at 2.59 percent in 2017 and 2.54 in 2018. The Nigeria population grew on a yearly average of 3.5%, and the US Census Bureau projects that the Nigerian population will be 402 million people in 2050.

With a population of almost 200 million people, vast mineral resources and favourable climatic and vegetation features, Nigeria has the largest domestic market in Sub-Saharan Africa. The domestic market is large and potentially attractive to domestic and foreign investment, as attested to by portfolio investment inflow of over N1.0 trillion into Nigeria through the Nigerian Stock Exchange (NSE) in 2003 (Central Bank of Nigeria, 2004). Investment income, however, has not been encouraging, which was a reflection of the sub-optimal operating environment largely resulting from inappropriate policy initiatives. Except for some years prior to the introduction of the Structural Adjustment Programme (SAP) in 1986, gross capital

formation as a proportion of the GDP was dismally low on an annual basis. It was observed that aggregate investment expenditure as a share of GDP grew from 16.9% in 1970 to a peak of 29.7% in 1976 before declining to an all-time low of 7.7% in 1985. Thereafter, the highest was 11.8% of GDP in 1990, before declining to 9.3% in 1994. From 1995, the investment/GDP ratio declined significantly to 5.8% and increased marginally to 7.0% in 1997 and remained there about till 2004 when 7.1% was recorded. On average, about four-fifth of Nigeria's national output was consumed annually.

The sub-optimal investment ratio in Nigeria could be traced to many factors, including exchange rate instability, persistent inflationary pressure, low level of domestic savings, inadequate physical and social infrastructure, fiscal and monetary policy slippages, low level of indigenous technology as well as political instability. A major factor was exchange rate instability, especially after the discontinuation of the exchange rate control policy. The high lending rate, low and unstable exchange rate of the domestic currency and the high rate of inflation made returns on investment to be negative in some cases and discouraging investment, especially when financed with loans. The Naira (Nigerian currency, N) exchange rate witnessed a continuous slide in all the segments of the foreign exchange market (that is, official, bureau de change and parallel markets). In the official market, the exchange rate depreciated progressively from N8.04 per US dollar in 1990 to N81.02 per dollar in 1995 and further to N129.22 in 2003 and N133.00 in 2004. Similarly, it depreciated from N9.62 and N9.61 per dollar in 1990 to N141.36 and N141.07 per dollar in 2003 in the bureau de change and parallel market, respectively.

Insert Table 6 here

With the progress in socio-economic terms in recent years, however, there is a need to address other aspects of the economy, such as insufficient infrastructure, to build strong and effective institutions, as well as governance issues and public financial management systems. In Table

6, only 59 percent of the Nigerian population had access to electricity in 2016, whereas India has 88 percent whilst China, the US, and UK recorded 100 percent access to electricity. Inadequate electricity supply invariably implies that firms would have to generate their power supply in order to invest in Nigeria. Generating own power supply could also have an impact on the cost of doing business in Nigeria which could discourage FDI. With regards to mobile cellular subscriptions per 100 people, Nigeria recorded about 82.98 subscriptions in 2016, whereas, India, China, the US, and the UK recorded 85.17, 97.25, 122.88, and 119.98 subscriptions respectively. This shows that although Nigeria's infrastructure in terms of access to electricity is poor, the country has high records of Mobile cellular subscriptions to facilitates communication and networking which in turn could also drive down the costs of doing business in Nigeria.

Insert Table 7 here

Having sustained socio-economic growth requires effective government institutions and a stable political climate (Jones, 2000). Nigeria has experienced a high level of insecurity, a high level of corruption and poor rule of law. As depicted in Table 7, Nigeria is ranked 12.5 on a scale of 100 among other countries in 2015 and ranked 13.46 in 2016. Ghana, another country in West Africa Sub-region, is ranked 52.88 in 2016 and 51.93 in 2016. China is ranked 48.55 in 2015 and 49.04 in 2016. Other advanced countries like the UK were ranked 94.75 in 2016, and the US was ranked 91.35 in 2016. In term terms of the rule of law, Nigeria still falls behind these nations ranked 15.86 in 2015 and 15.38 in 2016 (see Table 7).

2.5 Studies on Mono-product Economy and Economic Growth in Nigeria

Sanusi (2010) opined that “since independence in 1960, successive governments in Nigeria have pursued the goal of structural changes without much success”. He further stated Nigeria's past leaders engaged economic policies that were supposed to result in the growth of the

economy but rather the growth dynamics are propelled by the existence and exploitation of natural resources and primary products. In the beginning, the agricultural sector, driven by the demand for food and cash crops production, was the mainstay of the economy standing at the heart of the growth process; this contributed 54.7 percent to the GDP during in the 1960s. Suddenly, the 1970s brought about a boom of the oil industry as the main driver of growth. Agriculture was outrightly abandoned and relegated to the background. Since then, the economy of Nigeria has fallen into the temptations and gyrating within the oil boom-burst cycles of the oil industry. This can be seen in government expenditure as it majorly focuses its revenue generation solely on oil which dictates the pace of growth of the economy. In the same vein, Adeleye *et al* (2015) employed regression analysis as the method of analysis using co-integration and error correction modelling techniques to find the long-run relationship between economic performance and international trade. The study examined the impact of international trade on economic growth in Nigeria from the year 1988 to 2012. They employed net export and Balance of Payment as proxies for international trade while Gross Domestic Product represented economic growth. They revealed that only Total Export (TEX) remained positive and significant while others remained insignificant, which connotes that Nigeria is running a mono-product economy where only oil acts as the sole income generator of the economy without substantial support from other sectors.

Taking a keen look at the past, it is apparent that the economy has not performed to its full potential especially with the rate of the growing population. Sanusi (2010) again points out to the fact that there is almost no gap between population growth rates and economic growth that the margin between cannot induce the required structural transformation and economic diversification meaning a reasonable gap between economic growth and population growth rate enhances the possibilities of economic diversification, which in turn will lead to a healthy economy reflecting in the lives of her numerous citizens. As of 2010, Nigeria had the 6th largest

gas reserves and the 8th largest crude oil reserves in the world (Sanusi, 2010). Nigeria is endowed in such reserves in commercial quantities including 37 solid mineral types (Sanusi, 2010). Given these, economic performance has been rather woeful and does not reflect these endowments. Compared with other major emerging markets like Thailand, China, India, Malaysia, and Indonesia that were far behind Nigeria in terms of GDP per capita in 1970, these countries have managed their economy miles ahead of Nigeria.

According to the Nigeria Bureau of Statistics (2016), Nigeria's economy has over the years remained a mono-product economy heavily dependent on crude oil export for economic development. Crude oil exports as earlier observed, account for 90% of export products, hence, represent Nigeria's major source of foreign exchange earnings. The value of oil export rose to about 97% in 1984 from below 1% in 1958 and less than 90% since then. Oil was produced about 1.8 million bpd accounting for over 95% of exports and contributing 25 to 30% to the GDP. Nigeria is the sixth-largest producer of oil at the global level. Crude oil export dominates the greater percentage volume of Nigeria's export product and accounts for over 95% of the total value of merchandise exports (Itumo, 2016).

To achieve sustainable growth, the models of economic development hold that countries should diversify from primary exports into manufactured exports (Chenery, 1979; Hesse, 2008). Hesse (2008) further explained that export diversification can lead to immense growth provided that developing countries diversify their exports in order to enjoy the benefits of overcoming export instability or cushion the negative impact of trade solely on primary products. Hesse (2008) further reiterated that export diversification is instrumental in the economic development process of structural transformation where countries move from producing "poor-country goods" to "rich-country goods." Mejia (2011) argued that dependence on primary-product exports had been frequently mentioned as one of the main features of developing nations. Todaro and Smith (2006) noted that less developed countries (LDCs) tend to be specialised

instead in the production of primary products, rather than tertiary and secondary activities. Consequently, the exportation of primary products play a very significant role in terms of foreign exchange generation in these countries, traditionally representing a significant share of their gross national product (Todaro and Smith 2006). Primary-products exports have been characterised by relatively low-income elasticity of demand and inelastic price elasticity, being fuels, certain raw materials, and manufactured goods, some exceptions that exhibit relatively high-income elasticity (Mejia, 2011).

As stated by Ali *et al.* (1991) and Mejia (2011), export diversification entails changing the composition of a country's export mix, is it directly related to the structure of the economy and how it affects development proceeds. The underlying consideration on export diversification as a possible developmental strategy is related to the expectation of achieving stability-oriented and growth-oriented policy objectives (Ali *et al.*, 1991). A broader export base, coupled with a special promotion for commodities with positive price trends, are beneficial for economic growth. The value-added export commodities would then be stimulated through additional processing and marketing activities (Ali *et al.*, 1991). A degree of diversification of a country is usually considered as dependent upon the number of commodities within its export mix, as well as on the distribution of individual shares (Mejia, 2011).

According to Onayemi and Akintoye (2009), export is an instrument for growth that increases foreign exchange earnings, improves the balance of payment position, creates employment and development of export-oriented industries in the manufacturing sector and improves government revenue through levies tariffs, and taxes. These benefits tend to enhance the process of growth and development in such an economy. However, for these benefits can be fully realised, the structure and direction of these exports must be carefully tailored such that the economy will not depend on only one sector for the supply of needed foreign exchange (Adenugba and Sotubo, 2013).

Another logical reason for export and trade diversification, particularly for the Nigerian economy is the belief that oil is exhaustible and as postulated by Bassey (2012), that if no new discoveries as to oil substitute are made, the stock of oil in Nigeria will be exhausted in the year 2065. It is also important to consider Itumo's (2016) reasons for Nigeria to diversify and move away from a heavily oil-based economy. According to Itumo (2016), Nigeria has an acute shortage of infrastructure in virtually all areas of society. The road infrastructure still needs a lot of attention. There is a lack of access roads in some cases for the agricultural products produced locally to be evacuated to urban centres for food supply and further processing as in agro-allied industries. Also, the lack of good road infrastructure could impede the movement of people. Most times, bad roads have led to fatal accidents that claimed multiple lives (Itumo, 2016). This scenario applies to rail transport; it is moribund and is only being revived at the moment. The same applies to seaway transport and air transport; which are not yet at a higher level of operation.

The Nigeria power sector is still faced with a huge crisis of inadequate supply, vandalism of power installations and disruptions of gas-to-power turbines by pipelines sabotage. Although, there is considerable potentials about Nigeria's power generation as the country is located on the equator and can tap into the solar source of power supply (Itumo, 2016). Nigeria also has the advantage of oil resources which makes it easier for her to supply gas to power stations, but the sabotage impedes this development (Ali *et al.*, 1991). This situation is similar to the lack in the water resources sector, Nigeria has many water bodies, but good drinking water has not been made available to all Nigerians. To this end, Nigeria needs a heightened economic boost to make huge investments in infrastructure and other sectors.

Similarly, there is also the persisting infrastructural shortage in the housing sector with about 17 million housing deficits, which continues to grow with a profound increasing population of Nigeria estimated to be about 200 million. In the health sector, inadequate hospitals, lack of

access and reduced access to Medicare, inadequate number of physicians, drug counterfeiting, etc., all still exist and urgently needs to be addressed (Ali *et al.*, 1991). Addressing the gaps in housing infrastructure will need serious funding which can only be possible by economic buoyancy and boost that is not undermined by dependence on volatile product resources like crude oil (Mejia, 2011).

Nigeria's population represents one-fifth of the black race on earth. The Central Intelligence Agency (CIA) World Factbook (2015) puts Nigeria's population at 181,562,056 people. According to Guardian (2013), the Nigerian population would expectedly surpass the US Population by 2050 based on the United Nation's projections. The United Nation's forecast also predicts that Nigeria would by the end of the century, be the third most populous country. Furthermore, the CIA World Factbook (2015) indicates that youth population is more in Nigeria's case with about 30.56 percent of the population made up of 25-54 years age bracket, 19.38 percent is made up of the 15-24 years age bracket while 43.01 percent is made up of the 0-14 years age bracket. Nigeria has a huge youth population that is growing; 0-54 years of age bracket accounts for 92.95 percent of Nigeria's population. Hence, Nigeria's exploding population stands out as one of the major reasons why Nigeria must diversify away from single product resources like crude oil.

In terms of the political and institutional environment, there are security issues within the Nigerian geographic space that have raised serious concerns (Oluwagbemiga and Alabi, 2017). The notorious 'Boko Haram' group meaning 'Western Education Is Evil' have engaged in endless acts of terrorism which overtime have displaced millions of people and seen to the death of tens of thousands of people. The North-Eastern part of Nigeria which is the hotbed of the Boko Haram activities has been seriously devastated economically with the destruction of properties, business interest, viable investments and desertion by indigenes. To this end, investors might be discouraged to invest in such a geopolitical area and that is a minus for

economic wellbeing and growth of this area of Nigeria (Oluwagbemiga and Alabi, 2017). Nigeria has made it to the top 20 global destinations for FDI in the last decade, receiving one of the largest amounts of FDI in Africa (Adeola 2011). It has been ranked the 19th biggest recipient of foreign direct investment with a total of \$13.95 billion in 2009 in the world. FDI rose from \$2.1 billion in 2004 to \$13.95 billion in 2009, which indicated an increase of 564% between 2004 and 2009 (UNCTAD, 2009). Adeola (2011) claimed that this is however lower than other oil-producing countries in Africa including Angola which has focused on improving infrastructures and sector diversification away from primary oil production. Hence, the bulk of the funds were made in the oil and gas sector.

The South region of Nigeria is faced with militancy problems with new groups emerging by the day, targeting and destroying oil installations. For instance, in the Niger Delta region, different militancy groups are blowing up of pipelines, theft of crude oil, the kidnapping of expatriates, establishing illegal local refineries, etc (Oluwagbemiga and Alabi, 2017). Events of this nature have huge negative impacts on Nigeria's economic growth as a serious reduction is often occasioned in her crude oil quota supply at the international oil Market (Itumo, 2016). Nigerian needs to diversify away from crude oil and begin to enjoy an economic boost in order to have funds to adequately combat the scourge of terrorism and militancy (Oluwagbemiga and Alabi, 2017). To continuously depend on crude oil export has the implication of reduced revenue since the activities of the militants in the Niger Delta region of Nigeria reduce daily crude oil output and shrinks revenue earnings. The Boko Haram menace continues to exact more pressure on the government for the security of lives and property, with the government in high need of adequately arming its military, coupled with dwindling revenue source would hamper serving these objectives. Given the high youth population and the rising rate of unemployment as earlier discussed, what this implies is that it creates new recruits for violent groups (Itumo, 2016). The lack of transparency in the Nigerian oil and gas sector, particularly

under previous military administrations and governments, also presents a major challenge for economic governance.

In 2003, under the then President Olusegun Obasanjo, Nigeria was among the first countries to adopt the Extractive Industries Transparency Initiative (EITI) to help improve governance of the sector. One of the major reasons for the EITI was to conduct an independent audit of the oil and gas sector from 1999 to 2004 in order to instill transparency in the industry. This was an unprecedented exercise domestically, and Nigeria was the first country in the EITI initiative to commit to such an undertaking. The audit presented a number of instructive findings. Overall, 99.8 percent of revenues in the sector were accounted for, while 0.02 percent of aggregate revenue was unaccounted for. This remains within the conventional margin of error for such audits, although the audit showed a history of poor data-keeping. Equally revealing from the financial audit reports were minor disparities between revenues that oil companies reported as paid and the actual amounts received by the central bank. Another finding of the report was poor coordination among government agencies in the oil and gas sector. This lapse resulted in the fluctuations of revenues as captured in the periodic returns. For example, in some years, reported income exceeded what the central bank received while in other years the reverse occurred. A physical audit also pointed to the systematic loss of crude oil between the wellhead and export metering terminals. Poor metering infrastructure also hampered proper data collection on gross volumes. Of significant concerns was report findings regarding the petroleum minister's discretionary powers in oil block allocation arising from the Nigerian Petroleum Act of 1969, as such provisions could be subject to abuse. The findings of the report were subsequently disseminated to the public while various remediation measures have been introduced by successive governments with the introduction of the Petroleum Industry Bill (PIB).

One of such measure is the amnesty program which was introduced in 2007 by the Late President Musa Yaradua with the cardinal objectives of empowering militants in the Niger Delta region through skills training and development. This program led to the surrendering of arms and ammunition by the militants thereby drastically reducing restiveness in the region. Consequently, the Nigerian economy continues to see significant development with the addition of few other commissions such as the Industrial Development Coordination Commission (IDCC), these measures include foreign exchange (miscellaneous and monitoring provisions) and guided deregulation decree 1999, over the oil and gas sector spill-over. These policies stimulated by the ever-increasing global demand for crude oil and the attendant impact on its US dollar sale price per barrel. According to Albaladejo (2003), the extraction of oil is vital for the development of a developing country, but high dependence of it is considered inappropriate for sustainable economic growth as the sector is often badly affected by changing world prices. Since petroleum was first discovered in 1956 in Nigeria it has then become mostly dependent and the most important source of government revenue, foreign exchange and over-relying on it makes it almost vital for the Nigerian economy (Albaladejo 2003).

Nigeria's former President, Olusegun Obasanjo, in a statement observed that Nigeria is sitting on a keg of gun powder and the situation is a time bomb ticking and waiting to explode. Having a youthful and unemployment population leads to an increase in crime rate, militancy, theft, terrorism, armed robbery, restiveness, etc. (Adenugba and Sotubo, 2013). Also, another aspect that tends to aggravate the situation is the absence of social benefits within the country, meaning that a hungry youth has no subvention or any government intervention in any area of life (Todaro and Smith 2006). Such a scenario raises the vulnerability of youths to get involved in crimes. Hundreds of thousands of young Nigerians gain admission into the higher institutions every year, just as similar numbers graduate annually. Given the foregoing scenario, it is highly imperative that Nigeria to find a way to effectively harness the benefits of

crude oil and aggressively grow her economy through diversification in order to have means to create jobs as could reasonably absorb the unemployed at the job market.

Across the West African sub-region and the African region, Nigeria is the foremost economy in Africa with a GDP of over \$500 billion. Nigeria plays enormous economic roles at the sub-regional and regional levels in the African continent. Since it was established Nigeria has been the major funding source to ECOWAS. In terms of donations, Nigeria also lends economic support to some countries in Africa by donation, interventions and lead peacekeeping missions within the region and continent. A study by Eko *et al* (2013) on the diversification of Nigeria's economy focuses primarily on a dual approach. The study provides that tourism and Agriculture are viable means of getting the Nigerian economy from a mono-product direction to a diversified one. According to Eko *et al* (2013) diversification implies "gradual movement into new fields and expansion and stimulation of existing traditional products." Diversification does not impede specialisation but requires that resources be channeled into the best alternative uses (Ayeni, 1987; Iniodu, 1995). From a macroeconomic point of view, economic diversification promotes growth and development through the mobilization of savings from surplus sectors for use in the development of deficit sectors of the economy. However, before diversification due consideration should be given to the country-specific circumstances. This is important due to structural differences, a model that fits an economy perfectly well may prove irrelevant in another.

Onodugu, *et al* (2013) provides information on Nigeria since the 1970s, becoming a mono-cultural economy that relied heavily on oil as its major income generator. They further provided the implication of running a mono-culture economy being that the dynamics of the economy are at the whims and caprices of the price of oil, which for the most part, has been volatile (Enoma and Mustafa, 2011; Onodugu, *et al*, 2013). The Nigerian economy is mainly driven by one major commodity when looked at keenly, it can be observed that even the commodity

exported is primary goods. That is, the exported crude oil is processed abroad then sold back in fractions of finished products. Potable this process, it can be deduced that even the economy generally agreed by scholars in the literature as mono-cultured is semi-mono-cultured based on the export-import-chain. This calls for the building of refineries where crude oil can be fractionalised, and the by-products exported. This process will lead to a larger output which in turn will earn more income.

Enoma and Mustafa (2011), Onodugu, *et al.* (2013) and Itumo (2016) lists certain implications of Nigeria's oil-based economy. These implications are cited as: One, Volatility in government revenue due to the volatility of global oil price, for example, Nigeria's realisable revenue from crude oil export has declined as global oil price changes. At 2.2 million bpd oil production, Nigeria unequivocally earned more oil revenue in the past years when oil price was above USD 100, when compared to the second half of 2014 when the oil price came under USD100 and had declined to below USD 30 in early 2016, only to climb a to above \$40. Nigeria loses even more with a reduced crude oil price, given the fact that the cost of its oil production is more than some other oil-producing nations. It costs Nigeria about USD 20 to extract a barrel of crude oil from the ground, unlike Saudi Arabia that The Economist (2014) notes it costs \$5 - \$6 per barrel to extract its oil. Two, budget funding of three tiers of government of Nigeria (which are the federal, the state and the local government governments). The separate three tiers of government rely on crude oil revenue for budget funding which is shared from the financial account of the federal government. With this situation, the annual budget of state governments and local governments are dependent on the federal government budget as their main source of funding comes from the federal government financial accounts.

However, other sources of revenue available to the state governments or local government administrations are the internally generated revenues and levies collected locally and to which the federal government has no percentage share. Revenue from crude oil export contributes

about 70 percent of the distributable pool account of the country from where the federal government, state governments and local governments' administrations receive monthly allocations to fund their independent annual budget estimates. More so, the volatility in global oil prices practically decreased/increase revenue for a country like Nigeria that depends solely on crude oil revenue. Nigeria borrows from both local and international sources in a bid to fund its national budget, as reflected in 2016 budget of 6 trillion naira (about USD 30 billion) which government projects revenue of 4 trillion naira (about USD 20 billion) and would source 2 trillion naira (about USD 10 billion) through borrowing. Three, scarcity of foreign exchange. Given its mono-product economy, Nigeria is unequivocally a consumer economy. This is as a result of the high level of imported goods as against the volume of exported goods. Nigeria imports large stock of refined crude oil due to lack of requisite refining capacity. Currently, Nigeria has four refineries of which the cumulative output does not still meet local demand of the country with an estimated population of an estimated 200 million people. The declining oil revenue accruable to Nigeria means that foreign exchange, which earlier stood at about 90% sourced from crude oil export, had equally reduced. Importers in Nigeria have begun to face challenges of raising needed foreign exchange for the importation of products, which are crucial to national survival. Refined crude oil products imported into the country certainly needs foreign exchange and the scarcity means reduced supply leading to scarcity that in turn, negatively affects the population.

Recently, a few airlines that operate in Nigeria started to coerce passengers to pay for flight tickets in a foreign currency other than the Nigerian naira, a problem elicited by the huge airline's fund trapped within the country because of the shortage of foreign exchange in the economy. Similarly, some foreign investors have faced challenges of operation arising from scarcity of foreign exchange making it hard to repatriate capital or as often required for purchase of equipment from outside Nigeria. In terms of Nigerian indigenous businesses that

rely heavily on foreign exchange to import goods are also suffering as a result of the scarcity of foreign exchange. However, the bulk of importation into Nigeria is said to have reduced in the first quarter of 2016, linked amongst other things to the scarcity of foreign exchange for imports. Four, loss of value of the Naira. Since the mid-2014 as crude oil price at the global level decline, the naira has been losing value, moving from about 170 naira to \$1 to the first quarter of 2016 when the naira was at 400 naira to \$1 at the parallel market. At the CBN official price, the naira further slipped downwards. The government with the conviction that the naira should not be devalued continued to support the currency on the official exchange rate of 197 to \$1 for a long time. In the second quarter of 2016, the Nigerian government allowed the exchange rate of the naira to be determined by the free market forces of demand and supply, especially at the interbank rates in Nigeria.

The loss of value of the naira is enormous. If drawing from the example above, naira moved from below N175 to \$1 in 2014 to about N400 to \$1 in the first half of 2016. The naira loss of more than a hundred percent. The impact of naira's loss of value had been enormous. Businesses in Nigeria which borrowed money to invest would have to pay more in loan repayment. The loss of value of the naira also affected the Nigerian stock market which shed value of market capitalization over time as a result of the loss of value of various stocks.

Adefolaju (2014) provides that oil mono-product countries suffer similar predicaments. Adefolaju (2014) noted that the social consequence of the resource curse is that countries solely dependent on oil exports have unusually high poverty rates, poor health care, high rates of child mentality, and poor educational performance. This is because of the inability of such countries to diversify from oil dependence into other self-sustaining economic activities, particularly agriculture and labour-intensive industry. In a recent study by (Adefolaju, 2014), he noted that the rising level of poverty in Nigeria was due to poor governance and the monotonous economic structure of the country (Adefolaju, 2014). Adefolaju (2014) further says that

countries dependent on oil earnings also display unusually high rates of child mortality and child nutrition, low life expectancy, poor health care, and reduced expenditures on education as well as other sectors of the economy. The Nigerian government spends about \$2 per person/year on health care, a far cry from the \$34 per year recommended for developing countries by the World Health Organization (WHO). Compared against the world average of 26.5 malnourished children per thousand, Nigeria recorded 37.7 per thousand. Generally, the country lacks basic socio-economic infrastructures like good road networks, electricity supply and potable water, among others (Adefolaju, 2014). Irrespective of the huge export earnings from crude oil, the poverty rate in the country is still high. The huge export earnings are not reflected in the lives of Nigerian citizens. This implies that only a few share this wealth at the expense of the well-being of the rest.

From Dode (2012) point of view, the Nigerian economic system was diversified up to the middle 1950s, when crude oil was discovered in 1956 and in commercial quantity in 1958 at Oloibiri, in Brass Local government area of present Bayelsa State. Subsequently, Nigeria gained independence on October 1, 1960, with a diversified economy, even in the midst of crude oil exploration and exploitation. Unfortunately, not too long after that period, this history of diversification could not be sustained by the emerging ruling elite. The early 1970s witnessed a complete shift of economic focus from other sources of revenue earnings for the state to a natural resource (crude oil). This act of abandoning, to a large extent, all other sources of revenue generation and societal sustenance to concentrate on only oil has continued to date. The data available in this regard shows that for the past three decades, oil has accounted for between 80% and 90% of the country's foreign exchange earnings. This practice is not healthy for any nation that must record growth and development in all spheres of human endeavours (Dode, 2012).

According to Anyaehi and Areji (2015), there have been a whole lot of strategies provided by the Nigerian government to tackle the problem of mono-economy. Although efforts have been channeled towards the diversification of the economy, these efforts have been in futility in that governmental policies in this area have not been effective due to a number of challenges. Anyaehi and Areji (2015) are of the view that the Nigerian economy does not reflect productivity; instead, it is characterised by the sharing of wealth and who gets what. This orientation is rooted in the nation's psyche by the easy revenues gotten from the extraction of natural resources, especially petroleum. Investment of funds gotten from petroleum resources are not on long term productive ventures. Loans from both government and private sectors operate on high-interest rate and can only be economically used for only short-term projects. Hence, most of the loaned funds are used for trading (especially importation) which involves high turnover.

Consequently, this discourages investments in the industrialisation of the economy. A chunk of the country's revenue goes to the hands of those in the political class who lavish it on ostentatious materials which are mostly imported. Also, resources are wasted on bogus white elephant projects that are often incomplete and if completed, cannot be maintained resulting in dilapidation and rendering the product useless. They further note that mainstream of the economy, the business, and the working class are deprived of the necessary resources, which can encourage skill acquisition, industrialisation and productivity. Those who hold political offices are among the highest paid in the world while the common citizens and workers are among the least paid in the world. This is exactly the reason why many professionals and other elites abandon their areas of specialization and either juggle for political positions or leave the country for a better condition of service. Wealth gained from resources should be channeled towards creating productive jobs and industrialization. The importation of foreign goods should

be restricted in order to ensure the survival of indigenous industries (Anyaehei and Areji, 2015).

According to Anetekhai (2013), “the key components of macroeconomic policies are fiscal, monetary and trade policies.” He explains fiscal policies as focusing on budgetary, tax and debt management policy instruments. Budgetary policy brings about economic stability and thus control the rate of inflation in the economy. These will consequently influence the climate for the flow of investment, especially FDI. Tax policies that focus on personal and corporate tax rates, tax reliefs, and other tax concessions are key incentives (or disincentives) factors affecting consumption and investment decisions. A favourable corporate tax policy regime enhances after-tax profits and, to that extent, may promote increased investment. External debt burden affects a country’s international credit rating and its capacity attracts funds for public investment. Having poor international credit rating affects the flow of foreign private investment on one hand, while on the other, the level and quality of public investment directly affect the flow of both foreign and domestic private investment (Anetekhai, 2013).

The combination of measures designed to regulate the value, supply and cost of money in the economy is referred to as monetary policies. Liquidity, interest rates and foreign exchange rates are the channels through which monetary policy influences economic activities. Liquidity is affected by money supply. The level of money supply in the economy influences credit supply and interest rate (cost of capital). Interest rate thus influences consumption, savings and investment decisions. Basically, the existence of interest and exchange rate differentials, resulting from monetary policy measures, induces substitution between domestic and foreign assets (foreign currencies, bonds, securities real estate, etc) including domestic and foreign goods and services. The main instruments of market-based monetary policies since 1986 has been the open market operations (OMO), discount policy and changes in reserve requirements. Open market operations involve the discretionary power of the CBN to purchase or sell

securities in the financial markets in order to influence the volume of liquidity and levels of interest rates that ultimately affect the money supply (Anetekhai, 2013).

Finally, Anetekhai (2013) reiterated that trade policies are a very important component of structural adjustment policies. In terms of trade policies, the main focus is on measures to regulate export and import trade through such measures as tariffs, export and import quotas and prohibitions. They influence the investment climate in many ways. For instance, a liberal trade policy creates an incentive for foreign investors who may need to import raw materials and/or export products. On the other hand, protectionist trade policy creates an incentive for investors largely for locally produced and consumed, or investors in import -substitute products (Anetekhai, 2013).

Anyaehei and Areji (2015) also noted that another challenge militating against sustainable development and the diversification of the Nigerian economy. Development and diversification of the Nigerian economy face the challenge of poor economic and social infrastructure. Nigeria needs to invest its resources wisely on technological development, skill acquisition and human development, and provision of economic and social infrastructure for her to be on the path of sustainable development. Improved infrastructure will create an avenue for innovation and productivity among her dense population which will, in turn, boost the production of goods and services for both domestic consumption and export (Anyaehei and Areji, 2015).

It is apparent that the Nigerian government has the intention of economic diversification but lacks commitment. Anyaehei and Areji (2015) believe that to ensure a diversified economy, it is paramount for the government to be seriously committed to the course. The poor state of both corporate governance and institutions in the country is due to poor ethical standards in both public and private organizations which in turn frustrate the achievement of the goals of different economic and social policies. They further hold that, the Nigerian government has implemented numerous policies over the years to ensure economic development and

diversification but most of these policies yielded marginal effect as they were truncated along the course due to weak institutions and political instability occasioned by personal and sectional interests (Anyaehei and Areji, 2015).

As Anyaehei and Areji (2015) rightly put it, that “the endemic nature of corruption in Nigeria makes it very difficult to effectively manage the nation’s economy and sustain any policy that will transform the economy.” They hold that the policies implemented, and the structure of the economy is designed to satisfy certain individual or sectional interests. It is no news that huge earnings from the country’s resources are shared between a few which robs the ordinary citizens’ a good impact on their living standard. Nigeria is a country where some millionaires and billionaires cannot legitimately provide evidence on how their wealth was accrued. These individuals enjoy nepotistic advantages since they are friends to the government. Thus, this endemic corruption denies the country of revenue to generate infrastructural and economic development (Anyaehei and Areji, 2015).

According to Anyaehei and Areji (2015), the Nigerian educational system is not tailored to productivity but rather bureaucracy. The Nigerian educational system produces educated graduates without skills. Certificate acquisition is highly treasured above skill and productivity. This has led to a situation where there is a massive pool of unemployed graduates who continue to strain the economy. The Nigerian educational system needs to be restructured to produce the right graduates with requisite skills for the economy. Again, the educational system has to be well funded to create the enabling environment for academic exercise and put an end to incessant disruptions of academic activities (Anyaehei and Areji, 2015).

2.6 Dutch Disease Syndrome: A Case of Nigeria

Nigeria suffers from Dutch Disease Syndrome. The Dutch Disease Syndrome describes a situation whereby a sector that was initially a driver of economic growth (Agriculture in the

case of Nigeria) starts declining in performance due to the discovery of a natural resource. This Dutch Disease Syndrome in Nigeria developed into a big problem because the booming oil sector had the low absorptive capacity in terms of employment since many Nigerians lacked skill or competence required in the various oil sector activities. Moreover, the booming oil sector crowded out the agricultural sector that had the absorptive capacity in terms of employment, and this resulted in rising unemployment and a high level of poverty. An explanation for the Dutch Disease Syndrome in Nigeria is the dearth of linkages in the oil sector. In other words, there are no channels through which the gains reaped by oil companies flow to domestic enterprises including the small and medium scale. Thus, there is little or no inter-sectoral linkages (between the oil sector and the other sectors of the economy). If there were linkages, the ideal situation would have been that the domestic subsidiary firms (either created by oil companies in partnership with nationals or set up by domestic investors) will participate in the oil sector activities, and thereby generate employment and income for the domestic residents, leading to reduction in the level of poverty in the country. The dearth of linkages between the oil sector and the other sectors of the Nigerian economy is a critical developmental problem. One reason why there are no linkages in the oil sector is the capital intensive nature of the activities in the sector, and scarcity of capital in Nigeria coupled with the lack of local expertise. Thus, despite several governmental development initiatives local content remains very low. The

Nigeria is in dire need of foreign investment to complement domestic investment and resources. The supply side of the economy of Nigeria requires a massive injection of foreign resources needed to generate the necessary increase in output which is to promote growth in the industrial sector, reduce the rate of inflation, and stimulate the acquisition of foreign technology which would further stimulate economic growth in the country. However, Nigeria did not fully take advantage of the first FDI boom of the late 1980s, this was primarily because

of macroeconomic instability, frequent policy reversals, restrictions on some sectors of FDI and on the repatriation of profits and capital. A considerable amount of FDI flow into Nigeria began after 1986 when certain restrictions were lifted and infrastructure sectors were opened to private participation (the 1986 adjustment program constitute a bold policy response to attract foreign investors, correct internal and external imbalance). FDI flow into Nigeria has increased rapidly since 1999 due to the privatisation of banks, energy and telecommunication sectors, and gradually improving macroeconomic policy framework. In recent years, FDI represents by far the most important source of external financing for many African countries and Nigeria in particular. In 2005, FDI represented about 35.1 per cent of the total net GDP of Nigeria.

2.7 Chapter Summary

This chapter reviewed FDI trends and patterns assessing Nigeria's FDI performance as well as trends of FDI in the oil and gas sector. From the analysis, it can be observed that the oil and gas sector of the Nigerian economy outperformed other sectors in FDI performance in inflows and monetary terms. In comparison to other African countries with Natural resources as a motive for FDI, Nigeria's FDI is the second largest by inflows. It is also seen that the research landscape globally has become increasingly fluid and complex, with the share of FDI inflows into countries without natural resources in Africa such as Ethiopia, Zimbabwe and Niger are on the decline over the years. This chapter also revealed that although FDI into Nigeria is predominantly to the oil and gas sector, it was observed that other sectors of the Nigerian economy witnessed an increase, this can be attributed to the Nigerian governments resolve to diversify the Nigerian economy. This, therefore, suggests that the oil and gas sector of Nigeria outperformed other sectors and is accorded prime status by the Nigerian government.

This thesis is therefore inspired by the need to investigate the determinants of Nigeria's Oil and Gas FDI and its impact on economic growth and international trade. The next chapter will

provide an extensive review of FDI/MNE theories and literature on the motivations of Oil and Gas FDI with a view to developing the conceptual and analytical framework of this study.

3.0 Chapter Three: Literature Review on the Determinants of FDI in the Nigerian Oil and Gas Sector

3.1 Introduction

FDI is an attractive area to explore in the context of both developed and developing countries. Globalisation is changing the strategies of multinational companies (MNCs) and the way developing countries like Nigeria compete for FDI. FDI could help Nigeria in economic development and economic diversification as it brings about new technologies and broadens access to new markets through exports (Asiedu and Lien, 2004). The importance for the Nigerian government to diversify its economy emanated as a result of the dwindling oil prices in recent decades which has provoked social and economic instability in the country. According to Dunning and Lundan (2008), FDI is considered to be one of the crucial pillars in economic development strategies for resource-rich countries as it fosters economic growth activities through new skills and technologies. Dunning and Lundan (2008, pp.582) developed a theory to answer the question “why do companies invest abroad,” called the “OLI” paradigm. In this theory, FDI occurs with ownership-specific advantages (O) like proprietary technology; locational advantages (L) like low factor costs, and potential benefit from internalisation (I) of the production process abroad. International business literature postulates the potential determinants of FDI by categorising them into economic, political, and institutional factors. The economic factors include exchange rate, trade openness, infrastructure and market size (Leitão and Faustino, 2010; Alam and Zulfiqar Ali Shah, 2013). The political factors are government effectiveness, regulatory quality, political stability and level of corruption (Asiedu and Lien, 2004; Mina, 2009; Qian et al., 2010). The institutional factors comprise of inter-reliant structures and systems in a country (Bevan et al., 2004; Henisz and Swaminathan, 2008).

The level of the host country economic freedom enjoyed by investors is an appropriate measure of defining an institutional environment.

The objective of this chapter is to identify the potential determinants of FDI classified as economic, political, and institutional measures in Nigeria. Further economic factors may be divided into three parts, namely market-seeking, efficiency-seeking/resource-seeking, and strategy-seeking FDI. This chapter is organised in four main sections. Section One provides an introduction to the study. Section Two explains relevant theories of FDI relating to this research. Section Three reviews relevant empirical literature on the determinants of FDI in developing countries. Section Four provides a literature review supporting the theoretical framework of the study, and the study hypotheses developed.

3.2 Theories of Foreign Direct Investment

The determinants of FDI can be modelled from several traditional theories of FDI (Vernon, 1966; Buckley and Casson, 1976; Dunning, 1988, 2001; Nyuur, 2014; Surdu and Mellahi, 2014). However, these theories can be extended to explain the heterogeneity among MNEs as established in IB research i.e. developed vs developing countries (in the case of this study is OECD vs non-OECD countries). The underlining scholarly debate here suggests that only MNEs with pre-existing capabilities (i.e DM MNE) engage in FDI while MNE with no pre-existing capabilities receive FDI. However, some authors have contested this debate and propose new models to accommodate EM MNE FDI.

3.2.1 Theories of Developed Markets MNEs

Hymer Ownership Advantage

Since the emergence of MNEs and FDIs in the 1960s, scholars have made efforts to understand why firms expand internationally rather than simply export; what the motives and drivers of FDI decision making are and whether they differ by location (Nyuur, 2014; Surdu and Mellahi,

2014). Early studies based on Neoclassical trade theory tried to understand FDI as a part of international capital trade within the Heckscher-Ohlin framework of general equilibrium model, and therefore, the focus of FDI lay in country endowments and capital flows between two countries considering ‘relative factor endowments and relative factor costs’ as primary determinants of FDI (Faeth, 2009). However, later studies on FDI considered the Neoclassical framework had limited ability to explain this phenomenon with its assumption of perfect competition, and therefore, attempted to build a framework where MNEs make investment decisions between home and host markets based upon ‘structural market imperfections’ (Kindleberger, 1969 cited in Faeth, 2009; Hymer, 1976; Dunning, 2001; Goldstein, 2007). In this context, FDI theories began to be developed from an IB perspective as well as International Economics perspective, focusing on MNEs and their foreign investment as a subject of business and strategy studies (Faeth, 2009). In 1960 the term ‘Multinational Corporation’ was introduced by David Lilienthal (Kobrin, 2001). He defined Multinational Corporations as corporations which have their home in one country but also operate in other countries as well. Kobrin (2001) distinguished between portfolio and direct investment by defining the latter as industrial or commercial operations abroad which directly involves managerial responsibility. Hymer (1960; 1976) in his argument is more focused on ‘why, direct investment’ over portfolio investment. Hymer (1960; 1976) explained that the key determinant of the portfolio investment over the direct investment was controlled. This control advantage was termed Ownership advantage or Firm-Specific Advantage (FSA), which is a transferrable intangible asset (Dunning, 2001), including economies of scale, product differentiation, managerial expertise or knowledge advantages such as new technology and patent (Goldstein, 2007; Faeth, 2009). Based on the portfolio investment theory, capital moves from the place where there is a low interest rate to where there is a high interest rate until the interest rate is equal everywhere (Kisto, 2017). Here the theory assumes no barriers to capital movement such as risks and

uncertainties. However, Hymer argued that the theory of portfolio investment does not explain control (Hymer 1976). In portfolio investment, investors who invest in foreign countries do not have a right to control enterprises which they invested their money. Hymer gave two reasons why investors seek control: 1) multinational companies seek control over the foreign enterprise to make sure their investment is safe and 2) to eliminate competition in foreign countries and other countries. Hymer stated that multinational companies are motivated to invest in foreign countries due to certain advantages which they get through control of the enterprises. Hymer analysed the advantage of foreign firms over host firms. These advantages are getting factors of production at a lower cost, know-how, patents, capital etc. Where market imperfection exists there are issues relating to the barrier to market entry, high transaction cost. Hence, multinational companies prefer to engage in direct investments. Since then, many scholars have developed this 'Ownership advantage' concept in FDI studies. Kindleberger (1969) and Hymer (1976), focusing on 'market imperfection' and firms' 'monopolistic advantage', argued that firms invest in foreign markets to expand their market power by exploiting their FSAs in the host country. Knickerbocker (1973) also developed the 'theory of oligopolistic reaction', explaining that MNEs tend to follow the leader in oligopolistic markets in their FDI decisions to maintain their oligopolistic advantage (Sethi et al., 2002; Faeth, 2009). Dunning (1988) developed a more comprehensive framework regarding the 'advantage' concept within the Eclectic or OLI paradigm.

Starting from Ownership advantage, Dunning (1988) proposed that the US manufacturing affiliates in the UK should perform at least as well as their parent companies, and considerably better than their indigenous competitors under the assumption of Ownership advantage effect (Cantwell and Narula, 2003). However, Dunning (2001) showed that the productivity of US affiliates in the UK was not as high as their parent companies', although it was better than that of UK local competitors, leading him to the 'Locational advantage' concept. It was a while

later when he completed the OLI framework by including the ‘Internalisation advantage’ concept (Cuervo-Cazzura, 2012). The ‘Internalisation advantage’ concept began from the perspective of “why MNEs opted to generate or exploit their O specific advantages internally, rather than to acquire and/or sell these, or their rights, through the open market” (Dunning, 2001, pp.179). This ‘internalisation’ concept was not entirely new as Buckley and Casson (1976) had already developed a theory of the MNE applying Coase’s (1937) internalisation concept to MNEs (Dunning, 2001; Faeth, 2009; Buckley, 2014). Similarly, Hymer (1976) had the concept of internalisation theory within ‘imperfect markets’. His view was that in the case of intermediate goods markets such as production and marketing techniques or management skills, internalising these FSAs would certainly bring advantages to the MNEs when they invested in foreign countries (Faeth, 2009).

In these ‘traditional theories’ on FDI determinants, Ownership advantage has been considered as the key concept in explaining why firms go to foreign markets despite disadvantages such as uncertainty and liability of foreignness beyond the home boundary (Dunning, 2001; Goldstein, 2007; Faeth, 2009). In this context, Dunning (1993) himself also suggested various FDI motivations as natural resource-seeking, market-seeking, efficiency-seeking and strategic asset-seeking motivation. With Ownership advantage to exploit, firms invest in foreign countries to gain certain benefits from the host countries such as natural, physical or human resources (natural-resource seeking FDI), domestic, adjacent or regional markets (market seeking FDI). The rationalization of production to exploit economies of specialization and scope across or along value chains, i.e., product or process specialization (efficiency-seeking FDI), and even to advance a company’s regional or global strategy or link into foreign networks of created assets, such as technology, organisational capabilities and markets (strategic-asset seeking FDI) (Dunning, 1980; Faeth, 2009; Dunning, 1993).

Aliber's FDI Theory

Aliber's theory of FDI associates exchange rates with the movement of FDI among countries. According to Aliber (1970, 1971, 1993), the variation in economic growth rates among countries leads to variation in corresponding exchange rates. As a result, capital moves from stronger to weaker currency areas/locations. This implies that firms from locations with highly valued currencies are less concerned about the risk of the exchange rate in countries when they invest in locations with low valued currencies. Furthermore, that situation permits a firm operating under a strong currency to benefit from buying assets in countries with weaker currencies at less than their real value. Accordingly, countries that have strong currencies tend to become FDI exporters and countries with weak currencies tend to become FDI importers (Goldstein, 1991, Moosa, 2002).

The research of Froot and Stein (1991) supports Aliber's theory. Their findings suggest that the stability and strength of the Japanese Yen from 1978-1991 was one of the main reasons that helped Japan to become the biggest source of FDI during that period.

Moreover, the decreasing value of the US dollar during the period 1973- 1987 has been associated with an increasing FDI inflow to the US. Similar findings were produced by (Blonigen, 1997), who found a positive relationship between US dollar depreciation and Japanese FDI into the US during the period 1975-1992. Another contribution regarding the relationship between FDI and exchange rates can be found in the writings of Kohlhagen (1977), and Cushman (1988). However, some researchers have criticised this theory. Dunning (1988c), for example, suggests that the exchange rate theory of Aliber does not explain why firms invest abroad. He argued that it only describes how firms finance their operations in the scenario of different exchange rates. Furthermore, Phillips and Ahmadi-Esfahani (2008) elaborate further,

suggesting that there is no theoretical or empirical consensus to prove the linkages between FDI and exchange rates.

Product Life Cycle Theory

Vernon (1966) product life cycle theory has a significant contribution to the analysis of FDI. It analysed four production stages beginning with the invention of a new product. The product life cycle theory gives insight into why and how export is replaced by foreign investment. Vernon's work was based on the US enterprises that produced goods which were initially for the domestic market and later on for the international market. Vernon tried to understand the shift in international trade and international investment. At the initial stage, the enterprises are more focused on the domestic market (which is known in the IB literature as the home market). In the next stage, when the product matures, the firm starts exporting to developed countries. At this stage, innovating enterprises enjoy the profit of the sales of the newly invented product until rival enterprises imitate and produce the same product. Later as the demand for the product increases, the product will be standardised (Faroh and Shen, 2015), and the enterprises would think less of developed countries as the right production location.

Vernon (1966) explained FDI within a product cycle framework from the MNEs' strategic or behavioural perspective. He argued that products go through certain stages of their life cycle, and depending on these product life cycle stages, firms gradually transit from a domestic exporting organisation to FDI (Goldstein, 2007; Cuervo-Cazzura, 2012). Also, he argued that firms expand their FDI location to foreign markets which have similar characteristics to their home markets before moving to those which differ from their home markets (Goldstein, 2007; Faeth, 2009; Cuervo-Cazzura, 2012). Vernon's (1966) logic regarding the gradual transition from export to FDI and progression in the locational decision can also be traced to the Uppsala model (Goldstein, 2007; Cuervo-Cazzura, 2012). In this model, the reason for firms' incremental investment behaviour is 'psychic distance'. Psychic distance as defined by

Newman (2012, p.40) is “the sum of factors preventing the flow of information from and to the market”; these could be “market-specific knowledge about the business climate, and characteristics of customers and country customs” (Newman, 2012, p.40). Therefore, the ‘psychic distance’ can be formed by “differences in language, education, business practices, culture, and industrial development” and the key assumption behind this term is that this *distance* leads to uncertainty and risk in the host (Newman, 2012, p.40). These traditional theories and models which try to explain MNEs’ incremental investment behaviour are also categorised as the ‘incremental internationalisation process model’ (Cuervo-Cazurra, 2012).

With a similar perspective, Dunning (1981) developed the Investment Development Path (IDP) theory as an effort to apply his eclectic paradigm in relation to a countries’ economic development stage and FDI (Dunning, 2001; Narula and Guimon, 2010). Although the focus of IDP theory lies in macroeconomics aspects, its details differ from those of the theories above, which focus on firms’ strategy and behaviour side, IDP theory also supports a gradual process of FDI. Based on this theory, a country with a poor economic development is unlikely to receive inward FDI or to undertake outward FDI; however, as its economy develops, the country has increasing inward FDI flows first and then moves on to carry out FDI (Narula and Dunning, 2010). The progress of FDI of a country is also gradual, from outward FDI to regional hosts to those heading towards more international hosts.

Based on the review so far, FDI theory has been developed closely in line with the changes in the trend and characteristics of FDI in order to reflect a certain reality adjusted by this change (Aharoni, 2014). When trying to apply traditional FDI theories (which have been developed based on conventional DM FDI activities), a similar approach may be required to develop a theoretical framework for understanding EM FDI to DM host, as this new trend of FDI might demonstrate distinctive characteristics from DM FDI. Thus, the following section will explore how traditional theories have been applied to EM FDI and, by doing so, discover whether these

traditional theories are sufficient to understand EM FDI to DMs, or whether new perspectives or adjustments are required to build a theoretical framework.

Ownership, Location and Internalization (OLI) Framework

The OLI framework also known as Dunning's eclectic paradigm offers a unifying framework for determining the pattern of MNEs activities, to aid empirical investigation and to inspire new theories of MNEs (Cantwell and Narula, 2007). According to Dunning (1988, 2001), ownership, location and internalisation are a set of advantages for MNEs international expansion. As noted in Dunning (1988), MNEs develop competitive O advantages at home and then transfer these abroad to specific countries (depending on L advantages) through FDI, which allows the MNE to internalise the O advantages.

Dunning (1995, 1998, 2001) argued that the firm must possess O advantages for it to become an MNEs. O advantages are specific to the firm and are mobile across markets without affecting its potency. As the firm internationalises across borders the O advantages improve due to multi-nationality of operations (Dunning, 2006; Cantwell, 2010). Dunning (2000, 2008) identified three forms of O advantages: ownership asset advantages; economies of common governance, and institutional factors. Ownership asset advantages (similar to Hymer, 1960) relate to those advantages that are rare to imitate, unique and sustainable, for example, innovative competence of the firm in terms of its preparatory assets. Economies of common governance relates to advantages stemming from advantage of scale and relatively competencies of the managers of firms to identify, evaluate and harness resources and capabilities from throughout the world, and to coordinate these with the existing resources and capabilities under their jurisdiction in a way which best advances the long term interests of the firm (Dunning, 2000, 2006). The institutional factor relates to the instituted culture within the firm, for example; firm-specific norms or corporate culture, codes of conduct, as well as the institutional environment of the home country of the firm.

L advantages refer to a unique set of immobile resources and capabilities of a particular location or region. This distinctive and non-imitable set of location-bound created assets include factors endowment and availability, geographical factors or public intervention in the allocation of resources as reflected by legislation towards the production and licensing of technology, patent system, tax and exchange rate policies which a multinational would like either to avoid or to exploit (Dunning, 2000, 2001). Within the OLI framework, the location advantages are interdependent on ownership advantages, as well as internalisation advantages indicating the best route by which these advantages will be used. In other words, there is a constant interplay between 'O', 'L' and 'I' (Cantwell and Narula, 2007; Stoiana and Filippaios, 2008).

On location factors, Dunning (1981, 1998) argued that FDI determinants in either host or home countries cannot be taken into consideration without its motivations. Dunning (1981, 1998) proposed four taxonomy of motivations of FDI; Resource seeking; Market seeking; Efficiency-seeking; Strategic asset or capability seeking. The main aim of resource-seeking as a motivation to FDI is to obtain certain types of resources from host countries that are unavailable in the home countries of firms such as raw materials and natural resources. Resource-seeking motivations occur as a result of the availability of natural resources at a relatively lower cost in host countries compared to home countries. This could include cheap unskilled labour offered at cheaper prices and rates in contrast to home countries.

The prominence of natural resources as an FDI determinant by itself cannot be sufficient enough for the occurrence of FDI. The concept of comparative advantage comes into play in relation to natural resources which usually results to trade rather than FDI. For investment to take place in resource dominated countries that lack the required amount of capital typically needed to extract resources or require the technological know-how and technical skills to extract or sell its raw materials to other countries of the world, infrastructural facilities for getting the raw materials from of the host country and the final destination have to be created

(UNCTAD, 1998; Kudina and Jakubiak, 2012). Natural resource-seeking FDI is dependent on the fact that such resources desired for are location specific. Dunning (1993) emphasised the need to guarantee the cheaper and safer supply of natural resources to justify much of the FDI inflows in the 1800s and the nearly 1900's mostly to less developed areas of the globe from the most industrialised nations which are Europe, USA and Japan. Availability of natural resources essentially attracts foreign investors from two key emerging economies of the world (China and India) (UNCTAD, 2011). In Africa, countries with abundant natural resources are prominent recipients of FDI (UNCTAD-WIR, 1995). Such FDI inflows are championed by location advantages because these resources influence the location of firms in Africa. Top recipients of FDI inflows from China are countries endowed with natural resources such as Algeria, Sudan, Democratic Republic of Congo, Niger, Nigeria, Zambia and South Africa (Brown, 2012). India invested in the exploration and production of oil in Sudan while Chinese foreign investments are significantly in the exploration and production of oil and gas in Equatorial Guinea Democratic Republic of Congo, Chad, Gabon Nigeria and Tanzania (Brown, 2012).

Shiells (2003) suggested that FDI in the early 2000s related to natural resources extraction, pipelines construction for energy resources transportation, payment of debt to equity swaps for energy supplies, as well as massive privatisations in countries that fell out of the Soviet Union. Campos and Kinoshita (2003) described resource-seeking as a key FDI motivator in some countries which formerly forms the Soviet Union. According to Tondel (2001), inflows of FDI from IMF of about 75% and 82% given to Azerbaijan were for the oil and gas sector. Up to 2006, FDI inflows for Georgia were predominantly attached to pipeline transportation. Rogacheva and Mikerowa (2003) showed that in Russia an important determinant of FDI was the abundance of energy resources. Studies by Ledayeva (2007) show increase in the availability of oil and gas in relation to legislative policies and risk after the 1998 Russian

financial crisis whereas a decrease in interest on activities of seaports as well as political risk as costs of production in Russia did not attract FDI. Several authors (Wheeler and Moody, 1992; Loree and Guisinger, 1995; Morisset, 2000; and Asiedu, 2002) suggest that extraction of primary resources harnesses a country's labour potential as it requires a relatively rapid investment process to gain access to these resources. Exportation and importation have a controversial relationship with FDI. Dunning (1980) portray imports as a resource seeking factor and also emphasised as motivation the positive or negative relationship between FDI and trade. Dunning (1998) stated that there exists a substitute relationship between FDI and Imports if the host country usually imports as a way of trading from the home country and is subsequently motivated by lower trade barriers and lower transportation costs. As the home country begins to produce the same goods in the host country, there will exist in this scenario a negative relationship between imports and FDI. This relationship can also be complementary in the sense that FDI is strictly resource seeking.

The idea of seeking resources sometimes results in export-oriented multinationals paying less attention to local markets. Dinda (2010) argued that FDI inflow to Nigeria constitutes resource seeking investments, while market size plays a less significant role in FDI. Resource-seeking FDI undertaken to gain access to resources in host countries that are unavailable in the home countries or at a relatively low real cost when compared to the home country.

On the other hand, TNCs engage in market-seeking FDI activity to supply goods or services to regional, adjacent or domestic markets (Dunning and Lundan, 2008). These FDI activities take place to exploit new markets or to foster a firm's presence in existing markets (Dunning and Lundan, 2008; Cui et al., 2014), this is done through domestic assets acquisition which enhances the competitiveness of the firms in the specific markets. Dunning and Lundan (2008) explained that not only are sizes of the domestic market and the expectations of regional or domestic market growth the key forces behind a market-seeking FDI, but also the need for

TNCs to follow its customers to countries of destination, the need to minimize cost of transportation and production through export platform, the need to strengthen demonstrate presence caused by competing firms in leading markets, and the reorientation of the activities of production that align with requirements in the domestic market are forces that influence a market-seeking FDI to take place. Firms particularly undertake this market-seeking FDI activity to protect existing markets, to counteract behaviour of competitors and to preclude rivals and potential rivals from entering new markets. Host countries with large market size tend to attract FDI as an increase in market size increases opportunities for exploitation of economies of scale and efficient utilisation of resources for FDI (UNCTAD, 1998).

Buckley et al. (2007) realised some three factors that significantly impact FDI; the market size of the host country, policy liberalisation and cultural proximity. Larger countries attract FDI activity and investment compared to smaller countries. This was put forward by Harris (1954) who explained that producers are attracted to sites with better access to markets. Several empirical studies such as Head et al., (1999) and Bergstrand and Egger (2007) have linked significant positive effects with the market size. The main reason for market-seeking FDI is the exploitation of foreign markets by firms through the supply of host country markets with goods and services. While FDI can be direct or indirect, market-seeking FDI can exploit a market which doesn't necessarily have to be the market for which such FDI takes place, this is a problem underpinning market-seeking FDI. Chakrabarti (2001) showed the positive relationship between market size and FDI flows. Franco (2008) showed the main reason as to why MNEs engage in market-seeking FDI divided into two main sets of factors: (i) factors influencing the ability of the MNE to export goods and services (the issue of tradability); (ii) factors affecting the extent of appropriability of the results of the production process.

Buckley and Casson (1981) propounded a classical theory model where exports imply lower fixed costs and higher variable costs compared to FDI. Others (Taylor, 2002; Zhang, 2003;

Deng, 2004; Buckley et al., 2006) lay emphasis on rising offensive market-seeking motives that drive Chinese MNEs directed towards large markets; their theories suggested that horizontal market-oriented FDI associates positively with demand growth. This market hypothesis hold that more opportunities to generate profit arise from economies experiencing rapid growth. Dunning (2008) suggested that market seeking in FDI activity is undertaken as a way of protecting and sustaining existing markets, or promotion or exploitation of new markets.

Besides market size and market growth prospects, Dunning and Lundan (2008) heralded four main reasons as to why firms engage in either form of investment through market seeking. The first is that customers or main suppliers already have set up production facilities in foreign countries and in order to maintain their businesses, they follow them abroad. According to Dunning and Lundan (2008), the second reason as to why market-seeking FDI occurs is local content in the sense that goods and services need to be adapted to indigenous resources and capabilities, cultural mores and local tastes or needs. Thirdly, Dunning and Lundan (2008) were of the opinion that transaction costs and production costs of serving a local market from adjacent facilities are less than when supplying it from a distance; this is activity and country specific. The most essential and fourth reason, according to Dunning and Lundan (2008), is the necessity of large MNEs to have a physical presence in leading markets dominated by its competitors. Market seeking MNEs treat foreign affiliates as self-contained production units rather than as a part an integrated network of cross-border activities.

As per efficiency-seeking, this type of FDI tries to take advantage of differences in factor costs among locations. As it is concentrated on relatively unsophisticated tasks, it is especially seen in investments by firms from higher-cost regions into low-cost regions in order to reduce costs. The scope for efficiency-seeking FDI originates from advances in ICT, cost-effective transportation and trade liberalisation, which enable firms to take advantage of international

factor cost differentials. Efficiency-seeking FDI has contributed significantly to the growth in intra-industry trade flows (Gray, 1998). About 40 per cent of investments in FDI stock are in foreign operations that create the most competitive global production network which is equally cost-effective (Hansen and Rand 2006). Most efficiency-seeking FDI has interest in manufacturing and this can be ascertained from the rise in trade networking in components and parts (Hansen and Rand 2006), and such investments are directed increasingly towards services (e.g. R&D, call centres, business processing operations and IT services). Global cost pressures, trade liberalizations and continuing technology improvements ensure the growth of efficiency-seeking FDI whereas deregulation in economies of major developing markets, for instance, retailing in India or logistics or finance in China bring about increases with regards to market-seeking FDI. Efficiency-seeking FDI aims at rationalising structures of market seeking and resource-based investments of the firm thereby gaining from common governance on geographically dispersed activities (Hansen and Rand, 2006). The efficiency-seeking motivation also seeks to take advantage of several cultures, factor endowments, economic systems and policies, institutional arrangements as well as the structure of markets through production concentration on limited locations which supply multiple markets (Dunning, 1993). However, before efficiency-seeking FDI takes place, markets across borders have to be opened and well developed thus making it flourish within regionally integrated markets (Dunning, 1993). Furthermore, it is worthy of note that most of the large MNEs pursue pluralistic objectives, thereby engaging in FDI activity that combines characteristics of the above mentioned. Dunning (1993) also stated that such motives in foreign production changes as in the case of a firm that becomes an experienced and established foreign investor (Dunning, 1993). Developed economies are mostly engaged in FDI outflows and are major investors as 63 per cent of global outflow of FDI are from developed economies while 27 per cent are from emerging economies (UNCTAD World Investment Report, 2012). FDI outflows in the US

amounted to USD 281 billion; in Japan it amounted to USD 88 billion; in Germany FDI outflows amounted to USD 55 billion; in United Kingdom FDI outflows amounted to USD 78 billion; in France USD 47 billion and in China FDI outflows amounted to USD 42 billion (UNCTAD World Investment Report, 2012). Efficiency-seeking investments engaged in by firms intend to increase efficiency through the exploitation of economies of scope and scale, as well as common ownership. Dunning (1993) suggested that efficiency-seeking FDI usually comes in effect after either market or resource seeking FDI are realised thereby increasing the profitability of the firms. Scholars have argued that an efficiency-seeking FDI occurs as a result of investors that seek locations with a lower cost for its operations especially with regards to labour as low labour costs attract more investment in host countries. Cai (1999) and Buckley et al. (2007) argued against this assertion in the case of China as Chinese OFDI is explicitly not considered as a result of existing cheap labour. Furthermore, with regards to local assets in host economies as well as relative factor endowment, technology, and technical know-how is more likely to be engaged upon in FDI activity of host economies (UNCTAD, 1998). This will bring about a level of technological development compatible in host countries and also enable competitors as well as local suppliers to benefit and take advantage of certain spillovers by way of imitation and adaptation. Efficiency-seeking FDI in a world market perspective is expected to create earnings in foreign exchange in host economies where there exists a high growth impact in industries attracting efficiency-seeking FDI.

In the extractive industries sector, efficiency-seeking FDI is carried out in manufacturing and refining stages of the value chain. TNCs see as essential the economies of scale while exploiting disparities in factor endowments of economies by way of international value chain spreading, though there is a variation in the location determinants in steps of the value chain. Also, production of resources in such extractive industry sectors is dependent on its geological potential, accessibility, quality and risks that are involved in the production, such as reputation

risks and costs associated with firms or countries abandoned projects as a result of conflicts or political instability. Tavares et al. (2006) were of the opinion that refining in extractive industries depends on locational factors such as distribution and transportation costs involving market access and maximisation of production scale which is required to be balanced against each other. Stuckey (1983) and Whiteway (1996) further added that a significant role is played in the refining process by access to needed resources while citing an example with aluminium production where locational factors like rivers bring about energy generation opportunities as a source of cheap energy which is essentially valuable for aluminium refining plants. Stuckey (1983) and Whiteway (1996) also explained that such affordable energy could be seen as a source of horizontal integration in the energy industry. Efficiency-seeking FDI exploits the existing competitive advantages of the firm in a short-to-medium term but does not essentially transform its core competence in enhancing long-term competitiveness.

Internalisation Theory

Internalisation theory conceptualised by Buckley and Casson (1976) and later extended by Rugman (1981), Hannart (1982) and Dunning (1988) among others, explains the existence and functioning of the MNEs in foreign locations. The theory highlighted the interface between firms' external environment (market conditions) and channels for internal knowledge flows (Rugman and Verbeke, 2003, 2008). Proponents of internalisation theory argued that MNEs are a consequence of innovatory capability and not market power (Buckley and Casson, 1976; Rugman, 1981; Hannart, 1982). These authors argued that the dynamic innovatory capability of internal markets to substitute external diffusion of knowledge inhibited market imperfections for knowledge, such that, MNEs could exploit such knowledge to maximise profit (Buckley and Carter, 1999; Buckley 2016).

Market imperfections either in the form of information asymmetries or externalities are particularly significant in the markets for knowledge-based assets and thus, provide an

incentive to bypass them and bring foreign activities under common ownership i.e. MNEs (Buckley and Strange, 2011). This perspective corroborates with Coasian Transaction cost theory (Coase, 1937); here, internalisation theorists argued that market imperfections that exist in the intermediate product market might cause the firm to incur high transaction cost.

With regards to FDI location decision, internalisation theorists advise managers to invest in a location with low costs for which firms could internalise markets up to the boundary where the costs outweigh the benefits of further internalisation (Casson, 2015; Casson et al., 2016).

Building on internalisation theory, scholars argued that MNEs must possess firm-specific assets (FSAs), a precursor for successful internationalisation (Rugman and Verbeke, 1992, 2001, 2003; Kirca et al., 2011). Rugman and Verbeke (1992, 2001, 2003) and Kirca et al. (2011) argued that firms could generate abnormal returns from FSAs through the exploitation of market imperfections due to their more efficient structure and better governance. Exploiting FSAs also needs to be synchronised with country-specific assets (CSAs) to ensure successful internationalisation in foreign locations (Rugman, 1981; Rugman and Verbeke, 1992, 2001, 2003). Empirical evidence has shown that firms with high levels of FSAs achieve more significant gains from multinational activities than do those with low levels of technological and marketing assets (Kirca et al., 2011; Kirca et al., 2011). Aligning FSAs with CSAs allows the MNC to become both more proficient and efficient at exploiting its FSAs as it expands into foreign markets (Kirca et al., 2011).

Internalisation not only minimises costs (either transaction and coordination costs, or preventing leakage of valuable knowledge) but also, allows managers to select internal mechanisms that provides optimal returns (Casson et al., 2016). Internalising a market depends on the benefits. Internalization theorists propose a variety of entry mode choices available to firms (for example; exporting, contractual arrangement or wholly owned or partly owned subsidiaries) with a view to improving the competitiveness of the firm rather than merely

internalising (Tran et al., 2010; Tseng, 2015). However, internalising a market can be constrained by the institutions of the host location (Brother and Brother, 2000). Here, some scholars argued that incorporating institutional influence in internalisation theory may reduce the heavy reliance on transaction cost approach of internalisation theory (Brother and Brother, 2000; Chen and Hu, 2002). Another observation about internalisation theory is that it appears to best explain FDI in high-tech sectors and also ignore FDI in emerging market MNEs with relatively no FSAs in the foreign expansion (Ramamurti, 2009; Kirca et al., 2011). Overall, internalisation theory shed light on organisational internal mechanism and FDI in IB research. This has helped identify determinants that could affect the choice of entry in a foreign market in IB research.

Uppsala Internationalisation Model (UIM)

The development of the Uppsala internationalisation model (UIM) can be traced to the work of Johanson and Wiedersheim-Paul (1975) and Johanson and Vahlne (1977). These authors proposed that the internationalisation trajectory of MNEs is a product of gradual acquisition, integration, and use of experiential knowledge about foreign markets (in psychically similar locations to the home market). Johanson and Wiedersheim-Paul (1975) proposed four stages of the internationalisation process which are: the early stage i.e. no regular export activities; followed by exporting via independent representatives (or agents); followed by the establishment of an overseas sales subsidiary; and lastly, establishing foreign production/manufacturing units. Each of these stages embodies a series of incremental decisions that reflects gradual investment or resource commitments.

In adopting a gradual internationalisation trajectory, theorists of the UIM of MNEs assumed that firms strive to keep risk-taking at a low level and thus, are path-dependent (Johanson and Wiedersheim-Paul, 1975; Johanson and Vahlne, 1977). Johanson and Wiedersheim-Paul

(1975) further argued that managers' knowledge about foreign location would affect the degree of commitment of resources.

The lack of knowledge may relate to differences, for example, in language or culture between the home/host countries of the investing firms. Johanson and Vahlne (1977) refer to these phenomena as differences in geographical psychic distance. Johanson and Vahlne (1977) noted that the only way for managers to acquire knowledge is through experience. Building on this perspective in their recent studies, Johanson and Vahlne (2003, 2009) added trust-building, opportunity identification and exploitation as part of the building curve of a firm's knowledge.

The UIM, like product life cycle (PLC) theory, hypothesised a staged pattern of internationalisation. However, unlike PLC, the UIM highlights the importance of experience and learning in the international business literature. The PLC, on the other hand, established the relevance of product innovativeness and locational competitiveness in IB study. To this end, both theories are relevant in understanding and explaining the behaviour of MNEs.

3.2.2 Theories of Emerging Market MNEs

Resource-Based Theory (RBT) (Adapted for EMNEs)

The Resource-Based View (RBV) was initially developed to understand why firms' performances differ, arguing that a firm is a bundle of resources and capabilities, and firms vary by the selection and deployment of these bundles depending on market imperfections (Penrose, 1959, Cuervo-Cazurra and Genc, 2011; Wernerfelt, 1995, Moon and Roehl, 2001; Oliver, 1997; Goldstein, 2007). Facing market imperfections and competitors who are trying to imitate other firms' successful strategies, firms try to create barriers to acquisition, imitation, and substitution of key resources in order to maximise the rent potential of resources (Oliver, 1997). Therefore, the resource is more precious when it is more "scarce, unique, inimitable, durable, idiosyncratic, non-tradeable, intangible and non-substitutable", whilst 'the bundle'

includes firms' capabilities, which refer to "a firm's capacity to deploy resources" (Moon and Roehl, 2001, p.198). Based on RBV, these valuable and rare resources (both tangible and intangible) are the ultimate source of the firm's own competitive advantage and a firm's ability to transfer key resources efficiently within the firm in a "less codifiable" way leads the firm to outperform its competitors (Wernerfelt, 1984; Barney, 1991; Mathews, 2006; Goldstein, 2007; Chang and Rhee, 2011; Wang et al., 2012).

In this context, some scholars argue that the RBV is closely in line with conventional FDI theories on Ownership advantage and internalisation of the FSA, as the resources can be seen as the FSA and the capabilities can be seen as the internalisation capability in the conventional FDI theories (Moon and Roehl, 2001). In understanding FDI from an RBV perspective, firms with slack resources, which can function as a buffer against internal and external pressures (and various risks) and facilitate strategic behaviour, may generate enough monopolistic competitive advantages to overcome the liabilities of foreignness in the host (Chang and Rhee, 2011).

Therefore, FDI can be a strategic means for the firms to appropriate rents in overseas markets by exploiting these advantages (Wang et al., 2012). To this end, a firm's efficient transfer of valuable resources within the firm in the process of FDI, which is a complex deployment of resources, is critical to sustain its competitive advantage and to survive in the host country (Sarala and Vaara, 2010; Chang and Rhee, 2011). In this context, this RBV approach is compatible with subsequent theoretical developments of conventional FDI theories on Ownership advantage and internalisation capacity (Wernerfelt, 1984 cited in Sethi et al., 2002; Conner, 1991; Dunning, 1993; Wang et al., 2012).

However, at the same time, the RBV emphasises the strategic importance of the selection and deployment of resources in a dynamic and evolutionary way, compared to traditional FDI theories which see Ownership advantage as rather "static constraints" of the firm (Oliver, 1997;

Moon and Roehl, 2001). In this way, applying the RBV theory to FDI studies can extend the theoretical grounds for the EM FDI analysis, for which traditional FDI theories may find limitations in providing an appropriate framework, by understanding that EM firms can evaluate and access resources i.e., the selection and deployment of resources, differently from conventional DM firms (Mathews, 2006). In a similar context, Gammeltoft et al. (2012, pp.180) also suggest that EM FDI can be interpreted as EM firms' strategic process of establishing "fit" between the resources and the environment given to EM firms. Here, 'fit' is brought about through "alignment of organisational resources with environmental opportunities and threats". The adapted RBV from EMs' perspective can, therefore, provide a more specific theoretical framework for investigating EM firms' evaluation of, and access to, resources under the given environmental opportunities and threats, which differ significantly from those of conventional DM firms'. Here, the term 'adapted' reflects a distinctive application of the RBV from the EMs' perspective. With similar approaches to this study, i.e., emphasising the 'distinguished' view of EM FDI towards 'resource', other studies also suggested terms such as 'a recent RBV' (Mathews, 2006, pp.12) or an extended RBV (Goldstein, 2007) implying that their interpretation and application of RBV theory is differentiated from the traditional one.

The most distinctive characteristic of EM FDI is disadvantage caused by 'lack of FSA', home country constraints and intensifying competition at home markets due to radical liberalisation and globalisation process (Mathews, 2006, pp.14). This aspect reveals the limits of traditional FDI theories in explaining EM FDI as these theories assume 'advantage' is the key determinant of outward FDI. Therefore, Moon and Roehl (2001), who tried to understand some 'unconventional FDI' motivated by ownership disadvantages rather than determined by ownership advantages focusing on an imbalance concept, could provide a useful perspective to this study. The 'imbalance' concept was introduced by Penrose (1959), who argued that firms face imbalances in the process of building up their FSAs, and in the process of adjusting this

imbalance of FSAs, whether it is caused by advantages or disadvantages, firms may choose to go abroad if the firm cannot balance its strategic assets effectively in the firm's home country (Moon and Roehl, 2001; Cuervo-Cazurra and Genc, 2011). Based on this concept, Moon and Roehl (2001) had demonstrated how unconventional FDI can be motivated by ownership disadvantages in comparison to conventional FDI motivated by ownership advantages.

Another essential context of EM FDI is the 'highly globalised world' and 'radical liberalisation of EM home markets'. Although globalisation may promote EM FDI through liberalisation policies, the same liberalisation movement also intensifies competition in EM home countries at the same time (Contractor, 2013). In particular, for the EM firms' case, liberalisation in their home markets may have exposed them to the intensified foreign competition when they, and the market per se, were still vulnerable to competition (Aharoni, 2014). Moreover, in the adapted RBV framework for the analysis of EM FDI, EM MNEs see the global FDI market from the latecomer's perspective (Mathews, 2006; Luo and Tung, 2007). Again, the follower status is another kind of disadvantage discussed above. In this way, globalisation works as another push factor of EM FDI. Therefore, based on this adapted RBV approach, this study's assumption that the disadvantages EM firms are facing within themselves and in their home markets can be FDI determinants as push factors is supported.

These arguments are further supported when adopting the RBV approach to strategy analysis from EM firms' perspective. The RBV views slack resources as crucial for firms' performance and long-term survival (Bromiley, 1991; Tan and Peng, 2003 cited in Chang and Rhee, 2011; George, 2005). Given this perspective, Grant (1991) described the cycle of firms' resource selection, deployment capability assessment, competitive advantage building and strategic choice such as FDI by applying the RBV approach to strategy analysis. Grant (1991) argued that this cycle continues as the strategy stage involves "identifying resource gaps which need to be filled" and investing in replenishing, augmenting and upgrading the firm's resource base,

leading the cycle back to the resource selection stage. Following these arguments, EM FDI to DMs can also be understood as EM firms' strategic choice to access and retain resources required for their performance and survival. The difference of this phenomenon from the conventional understanding is that EM firms start from filling resource gaps and augmenting their resource base, i.e. the last stage of Grant's (1991) cycle, as these firms lack pre-existing resources or competitive advantages whilst DM hosts are generally assumed to be superior to EM home countries in terms of resource availability or competitive advantage level. The adapted RBV from EMs' perspective provides the theoretical framework for understanding the push factors aspect of EM FDI motivation. However, Mathews (2006), by defining internationalisation as the process by which firms become integrated into international economic activities, suggests that in understanding the integration process fully both push and pull factors are essential for a comprehensive formulation.

Therefore, in order to see the whole picture of EM FDI to DMs, understanding the pull factors as well as push factors is important, and for this, again the adapted RBV provides a useful standing point. There are some recent studies which directly focus on EM FDI cases within this kind of adapted or adjusted RBV framework from EMs' perspective.

As discussed above, in the adapted RBV framework for the analysis of EM FDI, EM MNEs view the global FDI market from a latecomers' perspective. From this position, the highly integrated world market is already an exogenous condition, and therefore these firms can see the world market as a pre-existing place full of resources into which they can tap into (Mathews, 2006). In this context, EM MNEs' involvement in FDI can be understood as a latecomer's catching-up strategy (Gerschenkron, 1962 cited in Mathews, 2006). Applying Grant's (1991) strategy analysis within an RBV approach to EM FDI, this study has already argued that EM FDI can be understood as EM firms' distinctive strategic choice to fill resource gaps and augment their resource base. Similarly, the 'latecomer's catching-up strategy' concept

also explains EM FDI, in that latecomers (EM firms) lack FSAs value resources because of accessibility, imitability and transferability (Mathews, 2006; Goldstein, 2007). Therefore, regarding a highly integrated world as their market from the outset (Mathews, 2006), EM MNEs' resource transfer direction turns to the external rather than internal to access a resource that is otherwise not available for accelerating their internationalisation to catch up with the incumbents in the global market (Mathews, 2006). This also helps them to avoid the home market competition which is intensified by globalisation (Child and Rodrigues, 2005; Deng, 2007; Ramamurti and Avenue, 2008). Following the arguments within the adapted RBV framework so far, the globalised world works as a pull factor for EM FDI as well as a push factor, because resource access and transfer from outside become important motivations for EM MNEs to go abroad as part of their latecomer's catching-up strategy. This argument is particularly persuasive for the EM FDI to DMs as the latter is generally assumed to have more abundant and better quality resources than EMs. The adapted RBV from EMs' perspective, therefore, provides a useful insight for building a more specific theoretical framework to understand the determinants of EM FDI to DM (in this case FDI from non-OECD countries).

When applying the imbalance concept developed from RBV to FDI study, not only ownership advantage but also disadvantages firms face can be a motivation for the FDI as a way to deal with the imbalance problem caused by disadvantages. Within this framework, the disadvantages EM firms face, such as lack of FSA issues and home market constraints can be assumed to be determinants of EM FDI as push factors. At the same time, when EM firms start actively joining in global FDI market, rapid globalisation movement becomes a given external condition. Within the adapted RBV framework from EM firm's perspective, EM MNEs are assumed to see the world market as latecomers who need to catch up with this fast integration process, while dealing with intensified competition at home market to the same globalisation. Therefore, as latecomers, EM MNEs see the world where abundant resources, which are

generally lacking in their firms and home market, are accessible as a result of globalisation and liberalisation. Within this framework, the globalised world can motivate EM FDI as both pull and push factors. Lastly, the assumption regarding resource access and transfer is even more persuasive for EM FDI to DMs, as DM hosts' more advanced level of resource and competitive advantage will be strong pull factors attracting EM MNEs seeking for resources. Based on the traditional FDI theories, EM MNEs within the RBV framework are assumed not to have any strong motivation for FDI due to their own lack of FSAs, and even if they do, the FDI development would be incremental and gradual.

Similarly, original RBV also sees that firms without enough slack resources would not take risky decisions such as FDI and even if they did so, their behaviour would be very cautious (Chang and Rhee, 2011). However, in contrast to these conventional expectations, EM FDI is a fast-growing phenomenon, and EM MNEs' locational choice is often very radical and risky. EM FDI to DM is one good example, as this expansion is far from gradual, despite the psychic and geographical distance between EM home and DM host. Furthermore, this kind of upstream investment is risky as EM firms usually do not possess any global strength or dominance over DM hosts (Contractor, 2013).

In a similar context, some studies have developed models to understand the distinctive aspects of EM FDI as an EM MNEs' strategy within an adapted RBV framework such as Mathews (2006)'s 'LLL (Leveraging, Linking and Learning) paradigm' or Luo and Tung (2007)'s springboard perspective. Mathew (2006)'s LLL paradigm is an alternative paradigm of internationalisation strategy for the EM MNEs, who are latecomers and newcomers, to Dunning's OLI paradigm for DM incumbents. Here, Linkage is the internationalisation strategy of latecomers and newcomers through which they utilise the globalised world for resource access to accelerate their integration into the world market. Leverage is a decision strategy on how to access the necessary resources, i.e. the ways that links can be established

with incumbents or partners so that resources can be leveraged and Learning results from repeated application of linkage and leverage processes. Leverage and Learning strategy explains many EM MNEs' recursive behaviour in that they acquire comparative advantages externally so that they can fight back against competition at home or in different host markets. Luo and Tung (2007)'s Springboard perspective also provides a very similar understanding of the LLL paradigm's regarding EM MNEs' internationalisation strategy. This framework explains EM MNEs' radical and path-independent behaviours such that "EM MNEs systematically and recursively use international expansion as a springboard to acquire critical resources needed to compete more effectively against their global rivals at home and abroad and to reduce their vulnerability to institutional and market constraints at home" (Luo and Tung, 2007, p.484).

Institutional Theory (Adapted for EMNEs)

Institutional theory on the behaviour of MNEs in international business research has in recent times received great scholarly interest (Morck et al., 2008). In the past, the institutional stance on FDI has been characterised by tight control of MNEs activities (Buckley et al., 2007; Zhang, 2003; Kang and Jiang, 2012). This has now changed due to the fact that FDI is largely considered one of the most stable components of capital flows (Benassy-Quere et al., 2007; Voss et al., 2009). With regards to FDI location, recent empirical studies have revealed that MNEs FDI location choice are likely to be shaped by institutional forces in their home country (Buckley et al., 2008; Kang and Jiang, 2012) and likewise the host countries (Globerman and Shapiro, 2002). The reasons for this include the quality of institutions may attract FDI via the rise in productivity prospects, via good governance and infrastructure, while poor institutions can bring additional costs to FDI.

Institutional theory is embodied by three pillars of institutional environment. These include regulative, normative and cognitive systems. The regulative pillar involves established rules

and laws. Regulatory systems ensure conformity with stated rules, and to effect sanctions for influencing future behaviour. In the literature, the regulative dimension of the institutional environment establishes the rules of the game that structures interaction (North, 1990). Organisations are bounded by these rules to successfully operate in a given location (also known as getting legitimacy). Legitimate organisations are those established by, and operating in accordance with, relevant legal and quasi-legal requirements of the host location (Scott, 2001; Kang and Jiang, 2012). FDI inflows for host regions might be far more limited in many instances due to the 'branch plant' syndrome (Fallon and Cook, 2010). Managers' decision on location choice is to determine favourable locations where regulative institutional constraints are less repressive to FDI activity so that MNEs can more readily conform to the regulative requirements of the host countries (Kang and Jiang, 2012). Empirical studies have revealed that regulative institutions have a strong influence on FDI inflows, for example, stable economic policy, security of property rights, less ownership restriction, and non-corrupt bureaucracy, are conducive to attracting FDI from MNEs (Bevan et al., 2004; Grosse and Trevino, 2005; Kang and Jiang, 2012). Drawing from prior empirical studies, regulative institutions are measured in three dimensions: economic regime, political/legal regime, and institutional regime directly regulating FDI activities.

According to Kang and Jiang (2012), the normative system imposes constraints on social behaviour through prescriptive and obligatory values and norms which imposes constraints on interpersonal and inter-organisational behaviour. From normative institutions perspective, MNEs need to establish social legitimacy, as in comparison to their local counterparts, because MNEs are more vulnerable to attacks from local interest groups and face more stereotypes and different standards (Kang and Jiang, 2012). It is asserted that establishing social legitimacy could be more complicated than the case for regulative legitimacy, as normative controls stress a deeper moral base and are more likely to be internalized than regulative controls (Scott, 2001;

Kang and Jiang, 2012). A major barrier to MNEs normative legitimacy is cultural distance (Yiu and Makino, 2002; Bhardwaj et al., 2007). The greater the cultural distance between the host and home countries, the more difficult it is for MNEs to gain normative legitimacy in the host country (Kang and Jiang, 2012).

Cognitive pillar relates to established structures in the society shaped by external stimuli (Scott, 2001). For example, if a particular type of practice is repeated by many organisations in high frequency, it will be routinized as a behavioural stereotype and accepted as a cognitive structure (Kang and Jiang, 2012). In the literature, this behavioural pattern is named mimetic isomorphism (DiMaggio and Powell, 1983). However, in the FDI location literature, empirical evidence demonstrates a bandwagon effect that has resulted in a follow-the-leader approach of decision-making (Sethi et al., 2002; Kang and Jiang, 2012). Here, a high frequency of business transactions conducted by firms of the home economy in a host economy over time creates a repetitive pattern of business dealings or trade relations which can become capitalised and objectified. As such, by imitating this location pattern in trade relations, investing firms may expand the business transaction pattern or FDI to another similar location of interest (Buckley et al., 2008).

Institutions also have a great significance in understanding EM FDI for several reasons. Firstly, one of the major reasons can be found in EMs themselves. Since these markets' entrance onto the world stage, which seemed to belong only to DMs until then, institutions have become regarded as a useful tool for understanding the new players. This is because of the profound differences between EMs and conventional DM players result largely from 'institutional issues'. Institutions are usually created and characterised depending on the "given lumpy indivisibilities" of each country, and they in turn "shape the direction of long-run economic change" in those countries (North, 1990, p.16). For example, for DMs, where "markets work smoothly", the market mechanism or more broadly, market-institutions, are key factors in their

economy, while other institutional factors are considered as “almost invisible” or just a “background” (Peng et al., 2008). However, in EMs where “inefficient forms of exchange” are common in markets, “the absence of...institutions is conspicuous” (North, 1990; McMillan, 2007 cited in Peng et al., 2008). Therefore, following North (1990), it can be assumed that institution creation in these countries is influenced by this condition.

Current interest in institutions related to EMs has been initiated by recognition of ‘underdeveloped market and related institutions’ in those markets. More recently, this recognition has developed into a realisation of the necessity of bringing institutions from the background to the main stage when discussing EM issues to supplement traditional market theories which have been developed under a “discipline of the competitive market” assumption (North, 1990 p.11; Acemoglu et al., 2004; World Bank, 2005; Rodrik, 2006; Demetriades, 2008). These issues were particularly relevant in the globalisation and liberalisation context. Once developing markets and transition economies started joining the global market, and particularly after the 1980s’ debt crisis in these economies, neoliberalism, derived from neoclassical economics emphasising the critical role of the market, gained influence (Aharoni, 2014). The neoliberal assumption was that the institutional structure in these economies was not ‘liberal’ enough to encourage the market to play its ‘magical role’, and therefore ‘radical institutional transformation’ through market liberalisation policies was required in these economies (US president Reagan’s reference in Cancun, Mexico in 1981 cited in Todaro and Smith, 2009; Kiely, 2007). Supported by the West and influential international financial institutions such as the World Bank and the International Monetary Fund (IMF), market liberalisation policies were promoted as the ‘solution’ for developing and transition economies throughout the 1980s and 1990s (Rodrik, 2006; Kiely, 2007; Todaro and Smith, 2009; Aharoni, 2014). Many EMs, therefore, have been experiencing radical institutional changes through policies as a part of the globalisation and liberalisation process. Although these globalisation

and liberalisation movements affected DMs as well as EMs, the latter tend to have more fundamental and comprehensive changes introduced to the formal and informal rules of the game that affect firms as players, as their domestic market reforms were more radical than those in the former (Peng, 2003; Peng et al., 2008).

Moreover, these were often the result of external pressures exerted from international financial institutions or the West (Rodrik, 2006; Yamakawa et al., 2008; Todaro and Smith, 2009). However, at the same time, institutional development is a complex and lengthy process shaped by a country's history, political and social systems, and culture (and therefore), dismantling government intervention and reducing barriers to international trade and investment do not immediately produce well-functioning markets (Khanna and Palepu, 2010). Thus, understanding EMs fully requires an understanding of the institutional dynamics in these countries, and in this context, institutional theory can provide valuable insight into understanding “the complex and rapidly changing relationships” between the institutional environments and firms strategic activities such as EM FDI (Peng et al., 2008).

Secondly, institutions have a great significance in understanding EM FDI, because institutional constraints and government influence in their home countries shape a large part of this phenomenon. In EM FDI, their governments' role has been critical since the beginning of the first wave of EM FDI (Gammeltoft et al., 2012). This study has already indicated how different government policies in the Latin-American and East Asian regions, i.e., import-substitution and export-orientation respectively, had different effects on their EM FDI. In addition to this kind of direct influence, government policy can also influence in developing formal institutions. As North (1990) states, institutions are often created to serve the interests of those with the bargaining power to devise new rules, and in fact many EM governments create and arrange institutions depending on the unequal bargaining power between various agents rather than in a way to “facilitate the functioning of markets” (Khanna and Palepu, 2010). Studies on

FDI suggest that “the munificence of a firm’s home country institutional environment has significant implications for its success internationally” (Li and Yao, 2010 p.3). Therefore, it is not difficult to assume that the home country institutional environment of EMs, which often works as institutional constraints for their firms, will affect their performance in the FDI market (Gammeltoft et al., 2012). In a similar context, both Luo and Tung (2007) and Khanna and Palepu (2010) pointed out that ‘EMs’ weak home institutions’ and ‘EMs’ poorly developed institutional structures including both market and other market-supportive ones, such as legal and governmental, are one of the key conditions which define EM. Khanna and Palepu (2010) further argued that the institutional voids in EM are what render a market still “emerging”. For example, some EMs, such as the United Arab Emirates (UAE), cannot be categorised as a DM despite their high ranking amongst the world’s economies by per-capita Gross Domestic Product (GDP) due to their market structure which suffers from institutional constraints (ibid). This aspect is essential in EM FDI, as these institutional constraints can work as disadvantages for EM firms which motivate or push them to go abroad. The institutional voids are “a prime source of the higher transaction costs and operating challenges” in EMs (Khanna and Palepu, 2010) and moreover, the inefficient institution creation and arrangement, depending on bargaining power, often results in other political cost and risk such as corruption or political instability (Gammeltoft et al., 2012). These home country institutional constraints deter EM firms from effectively dealing with the imbalance amongst their strategic assets caused by their lack of key assets or resources. Therefore, institutional theory can provide the theoretical groundwork for understanding the process of how these institutional constraints in EMs as disadvantages influence EM FDI.

Lastly, institutional theory has great significance in understanding EM FDI to DMs. This is due to the substantial institutional difference between these two markets. One of the critical interests in FDI theories lies in the ‘distance’ or ‘difference’ between home and host countries

as this is an activity carried out in ‘transnational’ or ‘multinational’ space (Morgan, 2001). From the institutional theory perspective, MNEs are understood as “social constructions... built out of specific national institutional contexts”, and therefore, when this theory is applied to IB or FDI studies, questions are often formed regarding the institutional duality between the home and the host context of the MNEs (ibid, p.1). This ‘institutional duality’ has a particular implication in the EM FDI to DM case considering the significant difference in their institutional settings (Gammeltoft et al., 2012). Issues of the gap or difference between home and host countries in FDI have already drawn attention from scholars, and frameworks regarding this perspective such as the Uppsala model’s “psychic distance” or the concept of “liability of foreignness” have already been developed (Johanson and Vahlne, 1977; Goldstein, 2007). It is not difficult to assume that firms investing in foreign countries will face difficulties such as unfamiliar institutional profiles including both formal rules and informal cultures, and thus, building legitimacy in the host market will be a great challenge for them (Kostova, 1999; Kostova and Zaheer, 1999; Li and Yao, 2010). Considering these arguments and that many EM MNEs are not in the ‘mature’ stage where firms have enough experience and resources to deploy risky and adventurous FDI strategies, the EM MNEs’ FDI decision to DM hosts, which is unfamiliar and ‘foreign’ to these firms, is quite a puzzling phenomenon. This raises questions regarding why this radical decision occurs.

Furthermore, it is critical for MNEs to understand the institutional background in both home and host countries and to devise the most suitable strategies for different institutional environments, in order to reduce the risks and costs derived from ‘liability of foreignness’. How these strategic decisions respond to ‘institutional difference’ between EM home and DM host will have a great implication for EM FDI to DM cases considering the substantial distance between these two markets. Thus, institutional theory can help develop detailed hypotheses and propositions regarding the research questions and sub-questions of this thesis on the

determinants and subsequent strategic decisions of the EM FDI to DMs at both entry and post-investment stages.

The next stage is to consider what is meant by ‘institutions’ and what does it mean to apply institutional theory to FDI studies. Starting from the perspectives of North (1990) and Scott (2008), institutions are considered as “the humanly devised constraints that structure human interaction” and institutional theory as “the processes by which institutions become established as authoritative guidelines for social behaviour” (Peng et al., 2009). Within this context, applying institutional theory to EM FDI means investigating whether, and how, institutions affect EM FDI decisions and activity. However, the argument that “institutions matter is hardly novel or controversial” as a list of studies above which have applied institutional theory in their FDI analyses shows, but “what is interesting is how institutions matter” (Peng et al., 2008). The following sub-section will review and discuss which perspectives of institutionalism are particularly selected for this thesis’ theoretical framework and how these specific perspectives can be applied to the analyses.

Although Peng et al. (2008) emphasised that ‘how institutions matter’ is an important aspect to consider in the application of institutional theory, many of the studies applying institutional theory in analyses of EM FDI, including Peng et al. (2008) themselves, often miss the detail of ‘how’ this theory is important, as they do not provide a clear idea of which perspectives from this theory are applied to their study. This can hinder engaging in a specific level of analysis such as “the meanings and usage of the concept of the institution” or developing institutional variables. There are various varieties of institutionalism (e.g., Institutional Economics, Organisational Institutionalism or Comparative Historical Institutionalism depending on academic disciplines, or ‘old’ and ‘new’ within the same discipline) and they differ regarding ‘how institutions matter’ in specific aspects such as the definition or the analysis level of

institutions, although they all agree that ‘institutions matter’ (Powell and DiMaggio, 1991; Scott, 2008).

3.3 Review of Empirical Studies of Factorial Determinants of FDI

Policy Liberalisation

Factors on policy liberalisation relate to variables on trade liberalisation/openness policies, exchange rate, inflation rate, labour costs and availability of skilled labour/education of the host location. In IB literature, FDI is viewed as a less volatile source of funding in the wake of the debt crisis and constraint in public funds (Chuhan et al., 1996). Since the early 1980s, there has been a *de facto* convergence of policies across economies from all regions to attract FDI and to ease the operations of MNEs (UNCTAD, 1994). It is argued that openness promotes FDI and foreign investors are not interested in committing long-term investment in a country that imposes tariff and non-tariff barriers on investment and creates problem in repatriating capitals as well as profits (Tsikata et al., 2000; Kandieru and Chitiya, 2003; Adhikary, 2011; Anyanwu, 2012). The level of trade openness also indicates the degree of comparative advantage of a country in undertaking investment. This relates to ‘transaction cost theory’ that postulates a low transaction cost environment generates financial incentives (higher return on investment) for both the domestic and foreign players in supplying large irreversible investment like FDI (Coase 1937, Williamson 1975). Edwards (1992) also noted that countries with a higher degree of economic openness can grow faster by absorbing new technologies at a faster rate than a country with a lower degree of openness (Ozturk and Acaravci, 2013). Another aspect of trade policy and business climate is exchange rate, inflation rate and interest rate. These variables measure the stability of the economy of the host location to support long-term investment like FDI (Obwona, 2001; Kyereboah-Coleman and Agyire-Tettey, 2008). Obwona (2001) showed that macroeconomic stability and policy consistency are important

parameters determining the flow of FDI in Uganda. In the case of Nigeria, studies have shown that macroeconomic risk factors (like inflation and exchange rate) are significant determinants of FDI (Udoh and Egwaikhide, 2008; Dauda, 2009; Wafure and Nurudeen, 2010). The relevance of this finding to a country like Nigeria is that developing countries have continually exhibited high inflation rates and extreme budget deficits, which serve as a signal to foreign investors about the unreliability of such economies (Li and Liu, 2005). Another aspect of trade policy and business climate is labour cost and availability of skilled labour and education in the host location. Labour factor has a direct effect on production efficiency and costs. In the FDI literature, studies have shown that high labour costs discouraged FDI inflows (Noorbakhsh et al., 2001), while high labour productivity encourages FDI inflows (Al-Sadig, 2009). Empirical studies covering a large sample of developing countries, for example, Dasgupta et al. (1996), Hanson (1996), Narula (2002) revealed that MNEs are more interested in low wage labour in developing countries. Another perspective to this is that locations with lower labour costs could be linked to labour productivity and unionisation activities which in turn could affect the business climate and FDI (Boghean and State, 2015).

Infrastructure

Factors on Infrastructure relate to the level of infrastructure development, financial market development, and Foreign aid. In IB literature, the authors proposed that the quality of host location infrastructures could influence FDI inflows (Anyanwu and Erhijakpor, 2004; Asiedu, 2006). Ang (2008) argued that the provision of infrastructural support could raise the productivity of capital and expand the overall resource availability by increasing output. Asiedu (2006) found that countries with good infrastructures attract FDI in SSA. Udoh and Egwaikhide (2008) in their study of FDI in Nigeria between 1970 and 2005 found that infrastructure developments (appropriation size of government spending) are a crucial determinant of FDI inflows into the Nigerian economy. In terms of financial market development, IB scholars

argued that investors would prefer a freer and more developed financial market environment (Gouidar and Nourira, 2014). Noorbakhsh et al. (2001); Ang (2008); Gouidar and Nourira (2014) and Githaiga et al. (2015) all found that financial development (as measured by domestic credit to the private sector) is a statistically significant determinant of FDI inflows in developing countries. These authors further argued that the provision of efficient credit and financial services by the financial system may greatly facilitate technological transfer and induce positive externality, overall, boost the locational advantages that attract MNEs.

Another aspect of structural conditional factor is foreign aid. Foreign aid and FDI are complementary sources of capital to the host location. Foreign Aid, for example, Official Development Aid (ODA) are provided to support the building of necessary domestic infrastructures conducive to achieving national development and overall to facilitate direct investment flows in developing countries (United Nations, 2002). The oil and gas sector attract huge foreign investment as well as corresponding corporate social responsibility. Selaya and Sunesen (2012) empirical investigation revealed that aid invested in complementary inputs draws in FDI in that sector. Anyanwu (2012), using cross-country time-series data of African countries for the period 1996-2008 revealed that higher FDI goes where foreign aid also goes in Africa.

Institutional/political risk factors

Political risk can be defined as “The risk that the returns to investment may suffer as a result of low institutional quality and political instability” (Hayakawa et al., 2013:13). Political factors have a considerable influence on FDI flows and may even have advanced importance in relation to expected economic benefits for a certain country (Aharoni, 1979). In theory, political risk is accounted for as a "sunk cost" or a cost of future events. Thus, uncertainty regarding political factors imposes additional and unpredictable costs (Hayakawa et al., 2013).

Asiedu (2002) in a study on determinants of FDI flows to SSA, concluded that FDI in Africa is not solely determined by the availability of natural resources, but also that institutional factors play an important role in directing FDI through macroeconomic and political stability and efficient institutions. Asiedu (2006) used panel data for 22 countries over the period 1984-2000 to examine the impact of government policies, political instability and the quality of the host country's institutions on FDI. The study results showed that less corruption, political stability and a reliable legal system promotes FDI. Asiedu (2006) found that an efficient legal system, less corruption and political stability promote inward FDI to SSA countries. In another related study, Cleeve (2004) examined the effectiveness of fiscal incentive to attracting FDI to SSA countries using multiple regression analysis. The study provided support for fiscal incentive to attract FDI to SSA after controlling for the traditional, political, institutional and policy variables. By contrast, Onyeiwu and Shrestha (2004) on a panel dataset for 29 African countries over the period 1975 to 1999, found that political rights were found to be unimportant for FDI flows to Africa. In the case of Nigeria, Salisu (2003) analysed the impact of corruption on FDI in Nigeria and found that corruption has a significant detrimental effect on FDI.

Trade openness

Theoretically, the impact of trade openness on FDI inflows depends initially on FDI motives (Dunning, 1993, Markusen and Maskus, 2002). Trade openness policies have been perceived to attract export-oriented FDI more than other types of FDI (Rogmans and Ebbbers, 2013). The degree of openness of an economy for FDI the more FDI it attracts (Mina, 2007). Here, IB scholar argued that the degree of trade openness is likely to influence the flows of international capital. The idea here is that foreign investors are not interested in committing long-term investment in a country that imposes tariff and non-tariff barriers on investment and creates problem in repatriating capitals as well as profits (Adhikary, 2011). The level of trade openness also indicates the degree of comparative advantage of a country in undertaking investment.

This relates to ‘transaction cost theory’ that postulates a low transaction cost environment generates financial incentives (higher return on investment) for both the domestic and foreign players in supplying large irreversible investment like FDI (Coase 1937, Williamson 1975). Edwards (1992) also points out that a country with a higher degree of economic openness can grow faster by absorbing new technologies at a faster rate than a country with a lower degree of openness (Ozturk and Acaravci, 2013).

An empirical study by Pistorresi (2000) reported a strong positive effect of openness on FDI. Wheeler and Mody (1992) observed strong support for the hypothesis in the manufacturing sector but a weak negative link in the electronics sector. Schmitz and Bieri (1972) revealed a weak positive link between openness and FDI. Chakrabarti (2001) also reported that openness to trade is more ‘likely’ to be correlated with its FDI than any other potential explanatory variables like wage, net exports, growth rate, tax, tariffs, and exchange rate. Mina (2007) reported that trade openness significantly encourages FDI in Gulf Cooperation Council (GCC) countries. While Ang (2008) reported that a one percentage point increase in trade openness would generate about a 1.094–1.323 percentage point increase in FDI inflows in Malaysia. By contrast, Moosa and Cardak (2006) found insignificant empirical evidence on the influence of trade openness on FDI.

A direct opposite of trade openness is trade barrier. According to Blonigen (2005), trade barrier may force foreign affiliates to substitute imports to direct production (this is known in the FDI literature as tariff-jumping FDI). There are few empirical studies on trade barrier, existing literature still date back to 1950s and 1990s (largely attributed to the convergence in trade openness across global economies). For example, Schmitz and Bieri (1972) and Lunn (1980) observed a significantly positive effect of trade barriers on FDI. But, Culem (1988) reported a significant negative correlation between trade barriers and FDI. While Blonigen and Feenstra (1996) found that trade barriers play an insignificant role in attracting FDI.

Other macroeconomic variables that attract FDI inflows are interest rates and inflation rate. These two variables measure the stability of the economy of the host location. With high inflation and interest rates represents the volatility of the host location for investments (both local and foreign). Authors like Li and Liu (2005) and Buckley (2007) document a negative relationship between inflation rate and interest rates on FDI. MNEs can raise funds within the host location to support their investments if interest rates become lower in the host country than in the home country. Highly volatile and unpredictable inflation rates in discourage market-seeking FDI due to market uncertainty and by making long-term corporate planning problematic, especially in respect of price-setting and profit expectations.

Yang et al. (2000) found that high-interest rates are negatively significant with FDI in the 1980s and early 1990s. Li and Liu (2005) found inflation rates are negatively associated with FDI inflows based on a sample of 84 countries for the periods between 1970 - 1999. Using different sample groups, the study revealed that a negative effect of inflation was only robust in developing countries while the effect of inflation was negative but not significant in developed countries. Li and Liu (2005) suggested that the negative relationship between inflation and FDI in a sample of developing countries is due to the fact that those countries have continually exhibited high inflation rates and extreme budget deficits, which serve as a signal to foreign investors about the unreliability of such economies. However, Gedik (2013) found no statistically significant relationship in their study.

Financial Development

In the FDI literature, it is viewed that efficiency-seeking investors would prefer a freer and more developed financial market (Gouidar and Nourira, 2014). Albulescu et al. (2010) after examining Central and Eastern European countries found that financial development (measured by interest spread) is a significant and positive determinant of FDI. Brada et al. (2006) used a similar proxy of interest spread as a measure of financial development as a

determinant of FDI in transition economies in the Baltics and Balkan regions. The study found a statistically significant result. Using another proxy variable for financial development i.e domestic credit to the private sector, Noorbakhsh et al. (2001); Ang (2008); Gouidar and Nouira (2014) and Githaiga et al. (2015) all found that financial development (as measured by domestic credit to private sector) is statistically significant determinant of FDI inflows. These authors, however, argued that domestic credit to the private sector is an appropriate measurement of financial development as it represents the opposite of stagnation in the financial market. They further reiterated that financial development acts as a mechanism that supports and facilitates the adoption of new technologies in the domestic economy. This, therefore, suggests that the provision of efficient credit and financial services by the financial system may greatly facilitate technological transfer and induce positive externality overall, boost the locational advantages that attract MNEs.

Taxation

FDI inflows react negatively to an increase in the corporate tax rate (Rjoub et al., 2017). This is in line with the argument that lowering the corporate tax rate is an effective policy instrument to boost inward FDI (Ang, 2008). For example, DeMooij et al. (2003) after conducting a meta-analysis of 25 empirical studies, revealed that 1%-point reduction in the host-country tax rate raises FDI in that country by 3.3%. Blonigen (2005) noted that the effects of taxes on FDI could vary substantially by measurement of FDI activity, type of taxes, and tax treatment in the host and parent countries. Earlier literature on taxation effects of FDI pointed to Hartman's papers (1984) which sign posted a way in which the certain types of FDI may not be sensitive to taxes. A key insight by Hartman is that earnings by an affiliate in a foreign country will ultimately be subject to parent and host country taxes regardless of whether it is repatriated or reinvested in the foreign affiliate to generate further earnings. Previous studies examining the effect of state taxes on state location of FDI found insignificant results (Coughlin et al., 1991).

Geographical distance

Drawing from Internationalization theory, when MNC exports in less familiar foreign markets, the MNC will then obtain enough experience and knowledge about the international markets and after some time will then set up a direct subsidiary operating in foreign markets. Greater distance causes transportation costs to increase. Cazarra (2008) using the distance between the centres of the home and host country in miles, revealed that there is a negative relationship between distance and FDI. Authors have also hypothesised that the effect of distance may be different across types of FDI. For example, Fukao and Wei (2008) revealed that the greater the distance is, the less vertical FDI occurs. Opposite results were found for horizontal FDI, indicating that greater distance promotes horizontal FDI. The results indicate that greater distance means higher transportation costs and in turn increase trade costs. As such, it encourages firms to produce goods abroad instead of serving host markets through export.

Cultural Distance

Strong socio-economic connections across national borders have been argued to influence the pattern of FDI (Buckley et al., 2007). Cultural similarity allows for an MNC to be risk-averse in investing in foreign markets (Chung, 1991). As noted by Buckley et al. (2007) Chinese in diaspora have been acknowledged to have contributed to the integration of China into the world economy since 1979. For instance, a number of scholars argue that ethnic and family partnerships constitute an FSA for Chinese MNEs because these help to reduce the business risk and transaction costs associated with the identification of business opportunities in certain foreign markets (Zhan, 1995). Although different measures have been employed by previous studies to analyse cultural, it is worth noting that empirical findings of cultural distance have been inconsistent.

Hecock and Jepsen (2013) found a positive and statistically significant effect of common language on FDI, the study by Habib and Zurawicki (2002) reported a negative but not significant impact of cultural distance.

Agglomeration

Agglomeration refers to the co-location and concentration of economic activities that give rise to economies of scale and positive externalities (Sun et al., 2002). The level of agglomeration in a particular location should be positively related to the FDI (Cantwell and Piscitello, 2002). Cantwell and Piscitello (2002) argued that firms are attracted to locations as a result of the presence of inter-organisational strategic assets due to a pool of specialised labour and innovation opportunities to improve their innovative performance. Braunerhjelm and Svensson (1996) showed that agglomeration (measured by the share of employees in an industry to all employees in the manufacturing sector) is positively associated with MNEs' location of FDI. Wheeler and Mody (1992) also revealed that agglomeration proxied by infrastructure quality (GDP per square kilometre; highway and railway mileage per square kilometre), the degree of industrialization (domestic investment per worker), and cumulative foreign investment (the ratio of the cumulative FDI relative to the cumulative domestic investment) positively attracts FDI. As revealed in Burger et al. (2008) localisation externalities are positively related to services than to other sectors, suggesting that services benefit more from concentration than other economic activities.

Antonietti and Cainelli (2008) reported that spatial agglomeration (measured by the probability of finding specialised external providers, face-to-face contacts and close spatial interaction) positively affects the location of business services in Italy.

Exchange Rates

The discussion on exchange rates and their effects on investment was the main focus of the currency areas theory of Aliber, where he conveyed his argument to explain MNCs' FDI activities from strong exchange rate countries into those with a weak exchange rate (Aliber, 1971). However, Agarwal (1980) asserts that Aliber's theory differs from any research that explains FDI movement internationally, and that exchange rates have no effect on FDI flows themselves, as much as it has on the timing of investments. Exchange rates can affect FDI inflows in three main aspects: the exchange rate itself as a value of a currency against another, changes and volatility and exchange rate regimes. Theoretically, MNCs from strong-currency countries can facilitate funding for their activities in a more effective manner in weak currency countries (Moosa, 2002, Takagi and Shi, 2011).

Further, weak currency countries mean inexpensive assets from the perspective of firms operating out of strong currency countries, which means that MNCs can buy assets in such countries (Cushman, 1985, Goldberg and Kolstad, 1994). Moreover, foreign firms in depreciated currency countries can gain benefits from lower wages and enhance their competitive advantages against competitors or those who work in countries with appreciating currencies (Klein and Rosengren, 1994, Goldberg, 2009). A number of empirical have shown a positive relationship between devaluation of exchange rates and inward FDI and a negative relationship between increasing exchange rates and inward FDI (Goldberg, 2009; Busse et al., 2013). For example, Froot and Stein (1991) put forward an imperfect capital markets explanation for why home country currency appreciation may increase foreign investment activity by the domestic firm. Here, imperfect capital markets mean that the internal cost of capital is lower than borrowing from external sources. An appreciation of the currency leads to increased firm wealth and provides the firm with greater low-cost funds to invest relative to the counterpart firms in the foreign country that experience the devaluation of their currency.

Klein and Rosengren (1994) revealed that US MNEs FDI in developing/emerging markets is explained by exchange rate depreciation in the host location.

Blonigen (1997) provided an alternative explanation to the relevance of the exchange rate to affect inward FDI for a host location. Blonigen (1997) argued that depreciation of host location currency would lower the price of the asset and thus attract MNEs for strategic asset seeking FDI. Empirical studies on the changes between the host and home countries' currencies have produce mix findings. For example, Swenson (1994), and Kogut and Chang (1996) examined whether short-run movements in exchange rates lead to increased inward FDI, they all reported an increase in inward FDI. Lipsey (2001) studied US FDI in three regions as they experienced currency crises and found that FDI flows are much more stable during these crises than other flows of capital. Desai et al. (2004) compared the performance of US foreign affiliates with local firms when faced with a currency crisis and documented that US foreign affiliates increase their investment, sales and assets significantly more than local firms during and subsequent to the crisis. They attribute the differences to MNEs abilities to finance investment internally to a larger extent than local firms. The results are consistent with the proposition that diminished currency value is associated with higher FDI inflows. This is because a depreciated currency value would lead to higher relative wealth position of foreign investors and hence lower the relative cost of capital. This allows foreign investors to make a significantly larger investment in terms of domestic currency. Stevens (1998) found that the US Dollar appreciation has negatively affected inward FDI to the US during the period from 1973 to 1988. Similar conclusions have been reached on the positive correlation between FDI inflows and exchange rate devaluation for 16 emerging economies from 1990-2002, by Udomkerdmongkol et al. (2006). Takagi and Shi (2011) also found that the appreciation of the Japanese Yen against ASEAN currencies was the main driving factor of the Japanese FDI in ASEAN between 1987 and 2008. Changes and volatility in exchange rates also have effects on FDI; it imposes severe

implications on the real value of FDI assets and it has similar impacts on the value of FDI profits (Busse et al., 2013; Goldberg, 2009). Empirically, Central and Eastern European countries that have lower exchange rate volatility have received greater FDI compared with those with higher volatility in rates during 1995-2008 (Arratibel et al., 2011). China provides a different example; Xu (2013) found that exchange rate volatility is correlated with greater FDI inflows to China from 2005 to 2011. The third dimension of exchange rates is the type of exchange rate system. An exchange rate regime, whether it is fixed, intermediate or floating can be seen as a sign of macroeconomic stability of the country (Buiter and Grafe, 2012).

Abbott et al. (2012) found that fixed and intermediate exchange rate systems encourage inflows of FDI more than fixable systems. The findings were conclusions from empirical research covering 70 developing countries across the period from 1985 to 2004. Aizenman (1993) also found that fixed exchange rate systems promote more inward FDI. However, Busse et al. (2013) argued that the positive effect of fixed exchange rate systems is robust in the case of developed countries only.

Natural Resources

There is a general assumption suggesting that countries rich in natural resources, for instance, crude oil and natural gas, tend to attract more FDI (Dunning, 1998, Asiedu, 2006, Sawkut et al., 2007). However, the empirical conclusions differ from this assumption, with the evidence in this aspect being mixed. On the one hand, Asiedu (2006) found that countries rich in natural resources in SSA have attracted FDI more than those with less natural resources during 1984 to 2000. Sawkut et al. (2007) also found such positive relationships between FDI and natural resource abundance in 20 African countries from 1990 to 2005. Mohamed and Sidiropoulos (2010) pointed out a positive correlation between these variables from MENA countries over the period 1975 to 2006.

On the other hand, the research of Mina (2007) suggested a different dynamic; he found that natural resource abundance in the Gulf Corporation Council (GCC) negatively affected inward FDI to these countries over the period 1980 to 2002. From a broader investigation, Asiedu (2013) found a negative relationship between natural resource abundance and inward FDI in 99 developing countries from 1984 to 2011. The 72 negative impacts of natural resources on FDI inflows might be attributed to a “resource curse”, and its related economic, social and political problems as the massive inflows of foreign currency imposes new economic, social and even political conditions (Poelhekke and Van der Ploeg, 2010).

3.4 Theoretical Framework and Hypothesis Development

The reviewed literature on the locational determinants of FDI showed that MNEs are attracted to host locations by different locational factors to meet their different strategic needs (Buckley *et al.*, 2007; Zheng and Tan 2011). Scholarly studies have shown that these locational factors could be linked market-seeking, efficiency-seeking, strategic assets-seeking and resource-seeking FDI (Dunning, 1998; Von Zedtwitz and Gassmann, 2002, Fallon and Cook, 2010, 2014). Drawing from the pioneering work by Dunning (1998) which distinguishes among four types of motivations of FDI (as per the host location advantages), this study focuses on market-seeking, efficiency-seeking, and natural resource-seeking as the theoretical framework for this study. Strategic asset-seeking FDI has been excluded due to the fact that Nigeria is relatively less known for technological innovativeness or creating strategic assets attractive to MNEs from advanced countries (Asiedu, 2002; Moses, 2011). Also, studies have shown that oil-rich countries are largely importers of technologies the more they rely heavily on oil wealth (as discussed in sections 1.1 and 2.6 “resource-course hypothesis”). As discussed in sections 3.2.1 and 3.2.2 (on the theories of FDI from advanced countries vs less developed countries), the underlining scholarly debate suggests that only MNEs with pre-existing capabilities (i.e DM

MNE) engage in FDI while MNE with no pre-existing capabilities receive FDI. However, some authors have contested this debate and propose new models to accommodate EM MNE FDI. Empirical studies have further shown that MNEs (from advanced countries vs less developed countries) follows different international trajectory, thus, are attracted by different locational determinants. The below empirical studies on locational determinants linked to Dunning's motivations of FDI develop the study hypotheses.

Market Seeking FDI

In the FDI literature, host market characteristics such as market size are widely accepted as a significant determinant of FDI flows (Chakrabarti, 2001). The larger the host market size (either at the country, region and sub-region levels) in terms of income level or potential economic prospect, the greater the amount of the FDI investment to that location (Akin, 2009). MNEs favour larger markets with a view to efficiently utilize its resources and exploit economies of scale (Chakrabarti, 2001). The market size directly affects investment return and profits, and a higher market growth indicates a potentially larger market and more promising prospects (Zheng, 2009). Market size is generally measured by Gross Domestic Product (GDP); GDP per capita income and size of the population. According to Kearney's (2005) FDI Confidence Index and track record of growth, Nigeria is West Africa's most populous and strategically important market. Nigeria's population has increased from less than 100 million 20 years ago to 180 million today.

The proxy of market size is expected to have a positive and significant determinant of FDI flows. For example, Nunes and Oscategui (2006) examined 15 Latin American countries while Vial (2002) examined Andean countries (Bolivia, Colombia, Ecuador, Peru); both studies found a positive relationship between market size (measured by GDP) and FDI.

In another related study, using annual time series data for the period 1960 to 2005, Ang (2008) examined the determinants of FDI for Malaysia and reported that real GDP is found to have a significant positive impact on FDI inflows. Ang (2008) further noted that a 1% increase in real GDP would lead to about 0.95% increase in inward FDI, representing an almost one-to-one relationship. These findings are similar with other empirical studies. Chakrabarti (2001). After employing extreme bound analysis on a cross-section dataset of 135 countries, reported that market size (as measured by per-capita GDP) attracts FDI. Moosa and Cardak (2006) using cross-section data on 138 countries (during the period between 1998 and 2000) and using extreme bound analysis, they reported evidence in support of the positive influence of market size (as measured by real GDP) effect on FDI. Resmini (2000) found that market size (as measured by GDP per capita and population size) was positively associated with FDI. Frenkel et al. (2004), building on gravity models and using data for the period 1992 to 2000 on bilateral FDI flows from G5 countries to 22 emerging markets, including Asian, Central European, and Latin American countries, found that GDP influenced FDI flows. However, when regionally separating the emerging markets into Latin America, Asia, and Central Europe, they reported that GDP matters only in Latin America and Central Europe and not in Asia. Carstensen and Toubal (2004) using panel data on FDI flows from 10 OECD home countries into 7 host CEECs in the period 1993 to 1999, found supportive evidence of market size (measured as the average output of all sample countries weighted by an inverse distance measure). These results suggest that the size of the domestic market results in more FDI inflows due to the benefits of the economies of scale and exploit potential economic prospect.

Factors on market-seeking FDI are widely accepted as significant determinants of FDI flows (Chakrabarti, 2001; Frenkel et al., 2004; Nunes and Oscategui, 2006). The larger the host market size in terms of income level or potential economic prospect, the greater the amount of the FDI investment to that location (Resmini, 2000; Carstensen and Toubal, 2004; Akin, 2009).

MNEs favour larger markets with a view to efficiently utilising its resources and exploit economies of scale (Chakrabarti, 2001). Empirical studies in the case of Nigeria also show a positive association between market condition (either proxy by size or growth rate) and general FDI inflows. However, little is known as to the effect of market conditions and FDI in the oil and gas sector in Nigeria. Like every other investment, FDI in oil and gas can also be targeted on the domestic market to meet the demand in the midstream/downstream industry of the sector (e.g. refining, transportation and marketing of petroleum products). As such, the potential demand for FDI outputs become a relevant factor in investment decision choice. To this end, the author hypothesised that (stated in the null form):

H1:

Market-seeking motives/factors are significant determinants of oil and gas FDI in Nigeria.

H1a:

Market-seeking motives/factors are significant determinants of OECD countries' oil and gas FDI in Nigeria.

H1b:

Market-seeking motives/factors are significant determinants of non-OECD countries' oil and gas FDI in Nigeria.

Natural Resource Seeking FDI

In IB literature, there is a consensus among IB researchers that FDI into developing countries (including developing African countries) are influenced largely by natural resource endowments. IB scholars have also noted that some developing countries attract FDI not because of cheap human resources, as widely observed in prior empirical studies, but based on newly created locational externalities, i.e. strategic assets (Pan, 2016). For African countries, the same cannot be said as their main locational determinants are still traditional factors like

natural resources e.g. crude oil, gold, coal and other social and economic factors. In Africa, most studies have shown that FDI inflow is attracted largely by natural resource endowments (Morisset, 2000; Asiedu, 2002; Mohamed and Sidiropoulos, 2010). Countries like Angola, Botswana, Namibia and Nigeria have received foreign investment targeted at the oil and minerals sectors of their economy (Basu and Srinivasan, 2002). For example, Asiedu (2006), using a panel data for 22 countries in SSA over the period 1984 to 2000, reported that countries that are endowed with natural resources attract more FDI. Dauda and Stein (2007) empirical investigation on factors attracting FDI to Nigeria between 1970 and 2006, reported that endowments of natural resources are significant determinants of FDI in Nigeria. Mohamed and Sidiropoulos (2010), using a panel of 12 MENA countries, concluded that the key determinants of FDI inflows in MENA countries are the natural resources, the size of the host economy and institutional variables. Hailu (2010) concluded that natural resources - labour quality, trade openness, market accession and infrastructure condition - positively and significantly affect FDI inflows. To this end, the author, therefore, hypothesised that (stated in the null form):

H2:

Natural resource-seeking motives/ factors are significant determinants of oil and gas FDI in Nigeria.

H2a:

Natural resource-seeking motives/factors are significant determinants of OECD countries' oil and gas FDI in Nigeria.

H2b:

Natural resource-seeking motives/factors are significant determinants of non-OECD countries' oil and gas FDI in Nigeria.

Efficiency Seeking FDI

Location with highly productive human capital or cheap labour force is regarded as a locational advantage that could attract FDI inflows for efficiency-seeking MNEs (Noorbakhsh et al., 2001). Labour factor has a direct effect on production efficiency/costs. In the FDI literature, studies have shown that high labour cost discouraged FDI Inflows (Noorbakhsh et al., 2001), while high labour productivity encourages FDI inflows (Al-Sadig, 2009). However, there is no precise measurement for labour, but widely used proxies include the measure of human capital/labour force and wage costs. For example, Al-Sadig (2009) and Noorbakhsh et al. (2001) used secondary school enrolment and literacy rates as proxies of human capital, and both studies showed a positive effect on FDI. Gemmell (1996) argued that secondary school enrolment was not the best measurement of human capital because it did not measure the stock of human capital but rather the flow of human capital. However, drawing on World Bank (1999) World Development Report, education remains an essential aspect in human capital development. An increase in the supply of educated people, as well as the quality of their education, can improve locational advantages (Noorbakhsh et al., 2001).

Education results in a labour force that is literate, numerate and skilled in the use of modern production facilities and techniques (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007). According to Lucas (1990), lack of human capital discouraged foreign investment in less-developed countries. Zhang and Markusen (1999) put forward a model where the availability of skilled labour in the host country is a direct requirement of MNEs and affects the volume of FDI commitment.

Empirical studies covering a large sample of developing countries, for example, Dasgupta et al. (1996) examining Japanese FDI in China, India, Indonesia, Malaysia, Philippines, Thailand and Vietnam, revealed that Japanese MNEs are more interested in low wage labour in their FDI in Asia. Hanson (1996) sample of 105 developing countries, noted that political stability and the security of property rights are more important determinants of FDI stock than human

capital. Root and Ahmed (1979) found that human capital and skilled labour are not a significant determinant of FDI inflows for 58 developing countries examined in their study. Narula (2002) investigates the determinants of the stock of inward investment in pooled regressions of 22 developing countries; the study revealed that human skills are positive but insignificant FDI determinants. Narula (2002) contrasts the results with those obtained for 18 industrialised countries, where technological capability and human skills are found to be highly significant and correctly signed. Narula (2002) argued that the inward investment into industrialised countries was increasingly aimed at seeking complementary created assets, unlike developing countries.

On the other hand, higher labour cost would result in a higher cost of production and is expected to limit the FDI (Vijayakumar et al., 2010). Nunes et al. (2006) empirical study of Latin American countries report a negative effect of labour costs (measured by wage rate) on FDI flows. Some studies have reported the wage rate as a positive determinant of FDI flows. For example, Resmini (2000) could not confirm the significance of lower wages and FDI. This is the case when labour cost equal labour productivity. To this end, the author therefore hypothesized that (stated in the null form):

H3:

Efficiency-seeking motives/factors are significant determinants of oil and gas FDI in Nigeria.

H3a:

Efficiency-seeking motives/factors are significant determinants of OECD countries' oil and gas FDI in Nigeria.

H3b:

Efficiency-seeking motives/factors are significant determinants of non-OECD countries' oil and gas FDI in Nigeria.

3.5 Chapter Summary

This chapter provides an extensive review of the extant literature on the motivations of oil and gas FDI. From this, FDI is revealed in this chapter to have the potentials to boost economic development and economic diversification in Nigeria as it brings about new technologies and broadens access to new markets. The chapter also reviewed the theoretical argument that behind MNEs from both developed and developing countries determinants of FDI. The next chapter will provide an extensive review of literature on the impact of Oil and Gas FDI on Nigeria's economic growth performance to develop the conceptual and analytical framework of this study.

4.0 Chapter Four: Literature Review on the Impact of Oil and Gas FDI on Nigeria's Economic Growth

4.1 Introduction

Many countries have renewed efforts over the past decade to improve the investment climate to obtain the positive benefits of FDI. Until very recently, FDI has been viewed with suspicion by most countries due to both the fear of loss of national sovereignty, and fear of the negative impact on domestic firms due to increased competition (Dupasquier and Osakwe, 2005). The bulk of the empirical studies have revealed several channels through which FDI may have positive or negative effect on economic growth (Akinlo, 2004). According to Melnyk et al. (2014) FDI help to boost growth in an economy by enhancing the supply of valuable technology and managerial know-how. The benefit of FDI is linked to the competitive advantage of MNEs over domestic firms due to their existing competences in technology, knowledge in production and management know-how. Lahiri and Ono (1998) added that an increase in competition and higher efficiency due to the presence of MNEs may help trigger lower product prices and hence, increasing consumers' spending or savings. Also, FDI can indirectly boost economic growth through employment opportunities by way of job creation (John, 2016). Koojaroenprasit (2012) attributed the higher efficiency of MNEs over domestic firms to augmentation of human capital through specialised training, technology and management expertise. Falki (2009) added that FDI contributes significantly to human resource development and capital formation. Another channel in which FDI potentially boosts economic growth is through "crowding in" effects on domestic investments which ultimately create positive "spillover effects" of technology transfer, knowledge and human capital development on domestic firms (Onyali and Okafor, 2014). However, from these empirical studies, the positive effects of FDI on economic growth becomes valid if such FDI originates from a more

industrialised or advanced economy to less developed economies (Melnyk et al., 2014; Pulatova, 2016, John, 2016).

Some authors have noted that the direct or indirect benefits of FDI on economic growth may depend on the sector of the economy within the host country (Akinlo, 2004; Koojaroenprasit, 2012). Akinlo (2004) argued that the bulk of the empirical FDI impact studies is concentrated on the manufacturing industries. Some studies have shown that FDI in other industries like the extractive industry have less impact on economic growth (Auty 1993; Sachs and Warner 2001). For example, Akinlo (2004) revealed that the transfer of technology between MNEs and domestic firms are less in the extractive industry. While, Alfaro (2003) in a cross-country showed that FDI in the primary sector tend to have a negative effect on growth as well as environmental damage, while investment in manufacturing a positive one. Also, FDI in the service sector is ambiguous.

Given that this study focuses on the extractive industry (i.e. oil and gas sector in Nigeria), it will thus investigate the impact of FDI in oil and gas sector on economic growth in Nigeria. Also, the study will identify other important factors drawing on the endogenous growth theory to explain the impact of FDI in oil and gas sector on economic growth in Nigeria. This study will complement existing empirical studies done on the subject matter in the case of Nigeria, for example; Akinlo (2004), Ayanwale (2007) and John (2016), who examined the impact of aggregate level FDI inflows in Nigeria and economic growth. This study will build on this literature stream by focusing on Nigeria oil and gas sector. The study findings will provide salient recommendations for policy-makers and strategies for investors in the Nigerian context. This chapter provides a critical review of the FDI impact literature to develop the study hypotheses.

4.2 Definition of Operational Terms

Paul et al. (2015) defined an economy as a social domain that emphasises the practices, discourses, and material expressions associated with the production, use, and management of resources; that is, the efficient management of resources in all aspects such as consumption and use, accounting and regulation, production, exchange and transfer, labour and welfare, technology and infrastructure, wealth and distribution. The economy in the simplest form refers to the general well-being and standard of living in a country. This explains why certain countries experience recession and why others experience boom (Paul et al., 2015).

Economic growth per capita is primarily driven by improvements in an economy's productivity, also called economic efficiency. Increased productivity means producing more goods and services with the same inputs of labour, capital, energy, and/or materials. For example, labour and land productivity in agriculture were increased during the Green Revolution. The Green Revolution of the 1940s to 1970s brought about new grain hybrids, which increased yields around the world. A high savings rate is also linked to the standard of living. Higher saving will, in the long run, lead to a permanently higher output (income) per capita as capital accumulation per individual also increases. Thus, growth is usually calculated in real terms, i.e. inflation-adjusted terms, in order to obviate the distorting effect of inflation on the price of the goods produced. In economics, "economic growth" or "economic growth theory" typically refers to the growth of potential output, i.e. production at "full employment", which is caused by growth in aggregate demand or observed output. It is conventionally measured as the percent rate of increase in the real GDP. GDP growth is an indication that businesses are hiring and investing. These indicators are mostly statistics that show government-issued health and growth of the country, most especially in the economic front.

Mono-Cultural Economy simply refers to an economy characterised by a single trade-commodity. This is a case where a chunk of its revenue is being generated or derived from just one commodity such as the case of Nigeria; the bulk of her revenue is derived from crude oil

proceeds. It is worth noting that a mono-product economy is the same as a mono-cultural economy. According to Itumo (2016) mono-cultural or mono-product economy is viewed as an economy mainly dependent on a single product or resource for economic growth and development. Put differently, the mono-product economy could further be referred to as a case where any country depends on a single product sales or exports for its budget funding especially to the tune of 70% of revenue. Itumo (2016) reiterated that Mono-cultural economy could also refer to the situation when any country depends on a basic product resource for overall higher percentage of national earnings and contribution to the GDP.

According to Dode (2012), mono-product economy implies an economic system that is essentially based on the existence of only one major economic product; depended upon for the economic sustenance of that economy. The implication is that the economic life and existence of that economy revolves around the existence, relevance and currency of that product; that economy remains a potentially buoyant one only if such product does fine in the international market. The reverse though would be the case, if it's showing at that level is poor (Dode, 2012). Mono-cultural economy is characterized by deriving most of the revenue from one single exportable product.

4.3 Theoretical Background and Hypotheses

The theories on the impact of FDI on economic growth can be viewed from two theoretical perspectives. These include neo-classical growth theory and endogenous economic growth models (Solow 1956, Romer, 1992; Aghion and Howitt, 1990; Sala-I-Martin, 1996). The neoclassical growth theory or Solow-Swan growth model (also known as exogenous growth theory) was pioneered by Solow (1956). Solow (1956) extended Harrod-Domar theory to proposed that economic growth is attained based on exogenous factors of production functions made up of stock of capital accumulation, labour and technology. According to Solow (1956), increased economic growth is as a result of an increase in the stock of investment accumulation given that labour and technology remain constant in the short-run (De Jager, 2004). In the short-run, the stock of capital accumulation is determined by the saving rate and the rate of capital depreciation. However, in the long-run, economic growth depends on technological progress through labour augmentation. From this perspective, proponents of this theory proposed that increased FDI and technology transfer will lead to human capital development and capital stock productivity which will thus lead to a more consistent return on investment and labour will grow exogenously (Elboiashi, 2011). Another prediction of the exogenous theory is that an economy will always converge towards a steady-state rate of growth, based on technological progress and the rate of labour force growth. Although, the theory explains long-run economic growth through technological progress, the main limitation is that it failed to explain how the diffusion of knowledge, technology and information are relevant in economic growth analysis (De Jager 2004; Ho et al., 2007; Elboiashi, 2011).

Barro and Sala-I-Martin (1995) demonstrated that there is a positive relationship between capital accumulation and economic growth over time. According to this theory, an increase in the stock of investment accumulation will result in an increase in growth assuming that the amount of labour and the level of technology remain constant (Barro and Sala-I-Martin 1995;

De Jager 2004). Therefore, economic growth is affected only in the short-run, determined by the stock of capital accumulation, which is determined by the saving rate and the rate of capital depreciation. On the other hand, economic growth is determined by exogenous factors such as technological progress, which takes the form of labour augmentation, in the long-run (Barro and Sala-I-Martin 1995). So, the growth of the economy depends on the stock of capital accumulation and the augmentation of labour force by technological progress. As a result, if new FDI-introduced technology leads to increased labour and capital stock productivity, this will lead to more consistent returns of investment, and labour will grow exogenously (De Jager 2004). In general, this theory argued that FDI enhances the capital stock in the host country, and then, in turn, promotes economic growth towards a new steady-state by the accumulation of capital formation. The argument of the exogenous growth theory is that FDI affects economic growth in the short-run through diminishing returns to capital; hence FDI promotes economic growth through raising domestic investment (DI) (Herzer et al., 2008). The main limitations of this theory are that it considers labour as human capital or knowledge. Economically, labour is a human capital because knowledge accumulates within a firm and is stored within the system of firms.

Additionally, this theory does not sufficiently explain the production and diffusion of technology, knowledge and the information that becomes gradually apparent in economic analysis (Ho et al., 2007). Neither does it provide an economic explanation about long-run growth and technological progress. It does, however, include a time trend to reflect technical progress in the long-run rate of economic growth (Barro and Sala-I-Martin 1995; De Jager 2004).

On the other hand, the endogenous growth theory is a direct response to the limitations of exogenous growth theory. Pioneered by Ayres (1962) and Uzawa (1965), the endogenous growth theory modelled to allow increasing returns to scale through endogenous technological

progress linked to human capital accumulation (Pollard et al., 2011). The mechanism of endogenous theory regarding the stock of human capital is that labour grows as a share of the population. This means that growth is promoted exogenously at a constant rate. Afterwards, this growth is stimulated by a labour augmenting technology multiplier, which means that this growth is promoted endogenously through labour augmenting technological change (De Jager 2004). However, the main feature of this theory is the absence of diminishing returns to capital (Ho et al., 2007). Therefore, technological progress in the form of the generation of new ideas is a crucial factor in passing to diminishing returns to capital in the long-run. The theory argued that technological progress is improved endogenously by taking knowledge from research and development (R&D) (as an example) and that the development of this knowledge can create positive externalities and positive growth spillover effects (Barro and Sala-I-Martin 1995; Ho et al., 2007).

Endogenous growth theory recognised the need for government policies, private sector institutions and market competition to nurture innovation and provide incentives for individuals to be inventive. Central to endogenous growth theory is the role of knowledge and public infrastructure in economic growth (Aghion and Howitt, 1992; Pollard et al., 2011). Unlike the neoclassical growth theory, in the long run, the endogenous growth model proposed that convergence would not occur mainly due to the fact that there are increasing returns to scale. Technology progress is improved endogenously by taking knowledge from research and development. The development of knowledge through R&D can create positive externalities and positive growth spillover effects considered as determinants of long-run economic growth (Ho et al., 2007; Pollard et al., 2011). FDI in this regard is expected to enhance the existing stock of knowledge through the transfer of technology, technology diffusion, labour training and skill acquisition through the introduction of alternative management practices and organisational arrangements. As a result, R&D, human capital accumulation and spillovers are

considered as determinants of long-run economic growth (Meyer 2003). Spillover effects occur as the knowledge generated by R&D in one country creates positive effects in other countries (De Mello 1997). Endogenous growth theory identifies economic growth as promoted in the long- run by the introduction of new technological production processes in the host country and that the FDI is assumed to be more productive than DI (De Mello 1999; Herzer et al., 2008). Thus, FDI enhances economic growth through technological spillovers. These offset the diminishing capital return effects by boosting the present stock of knowledge through labour mobility, training and skills, and through managerial skills and organisational arrangements (Romer, 1990; Barro and Sala-I-Martin 1995; De Jager 2004).

The Direct Impact of FDI on Economic Growth

FDI is expected to directly enhance the existing stock of knowledge in the recipient economy, through labour training and skill acquisition and technology diffusion; and also through the introduction of alternative management practices and organisational arrangements. Overall, the existence of various forms of externality stops the unrestrained decline of the marginal productivity of capital. As a result of this, foreign investors may increase productivity in the host economy and then FDI, this, in turn, can be considered as a catalyst of Direct Investment and technological progress. Also, an important mechanism through which FDI promotes growth in the host country is expected to be the FDI's externality effect on potential (De Mello, 1997; Borensztein et al., 1998). Furthermore, economic growth can increase exponentially over time (De Jager, 2004). Some investigators opined that the adverse effects of FDI on economic growth are expected to be twofold (De Mello 1999; Kim and Seo, 2003). One of the greatest limitations of this theory is that it has an invalid predictive ability in economic growth convergence to allow for the heterogeneity of economies and their different growth patterns (Ho et al., 2007). FDI can promote and stimulate economic growth in several ways (Herzer et al., 2008). Firstly, FDI can affect economic growth through the accumulation of capital by

introducing foreign technology and new goods. This view comes from the concept of the exogenous growth theory. Secondly, FDI can enhance economic growth by augmenting a stock of knowledge in the host country by knowledge transfer. This view comes from the viewpoint of the endogenous growth theory. Therefore, FDI, theoretically, can play a crucial role in economic growth through raising capital accumulation and technological spillovers or progress (Herzer et al., 2008).

FDI can directly impact growth through the incorporation of new inputs and capital accumulation, and foreign technologies in the production function of the host country. Empirically, Neoclassical and endogenous growth models have been widely used to test those theoretical benefits of FDI. However, the results are varying. The reasons include sample selection (e.g. developed versus less developed countries), the selected estimation techniques (e.g. OLS, Granger Causality, Cointegration, Error correction models), and the selected time period - the estimation methodology (i.e. time series versus cross- section). Dixon and Boswell (1996) argued that foreign investment has an initial positive effect on economic growth, but in the long run the dependence of the economy on foreign investment exerts a negative effect on economic growth. This is so because the level of infrastructure and institutions that develop with foreign investment bring about further foreign investment; as well as negative externalities such as over-urbanization, unemployment, and income inequality perpetuate the problem. Kentor and Boswell (2003) selected a different measure - foreign investment concentration - the percentage of total FDI stocks accounted for by the top investing country, illustrated a long-term negative effect on economic growth.

Furthermore, similar to Borensztein et al., (1998) , De Mello (1999) by utilizing a sample of non-OECD countries and OECD over the period 1970 to 1990, stated that the long-term growth in host countries is determined by the spillovers of technology and knowledge from the investing countries to host countries, and its extent is determined by the complementary and

substitution between FDI and domestic investment. In the non-OECD sample, he demonstrated no causation from FDI to growth based on fixed effects regressions and a negative short run impact of FDI on GDP, indicating that growth benefits may be restricted to higher income countries. Along this same theme, Blomstrom et al. (1994) in a cross-country analysis of 78 developing countries found that FDI had a positive effect on growth rates for higher income developing countries, but not for lower income developing countries. On the whole, the trade regime also plays a role in the transmission of positive growth effects from FDI. Balasubramanyam et al. (1996) from an annual cross-sectional data for 46 developing countries in a fixed effects model supported that the growth effect of FDI is positive in the export promoting countries but negative in the import substituting ones. Similarly, Zhang (2001), using cointegration and error correction techniques, found FDI enhances economic growth in Hong Kong, Indonesia, Singapore, Taiwan, and Mexico from 11 selected countries in the study; and for the other six countries without cointegration links, unidirectional causal effects were disclosed in five countries.

The Indirect Impact of FDI on Economic Growth

FDI has also attributed indirectly to facilitating economic growth. For example, FDI is considered as the primary channel through which technology transfer occurs. The subsequent effect of FDI on domestic economic growth depends on the diffusion of best practice through the local economy at large (Ajayi 2006). There are different forms of spillover effects that can be produced by MNCs and different channels through which they take place. The one motivating force behind attracting MNCs and associated FDI on the host economy is the boost of the domestic firm's productivity. This is correlated to the concept of productivity or technology, which embodies the fact that foreign enterprises own intangible assets, that can be passed on to domestic firms, improving their productivity level.

Thus, productivity distribution is an issue of externalities, which are often referred to as productivity spillovers, from established foreign producers to domestic producers (Proenca et al., 2002). Blomstrom and Kokko (1998) argued that when MNCs set up affiliates outside the home country, they are different from the existing firms in the host economy for two reasons. The first reason is that MNCs bring to the host economy some aggregate of their proprietary technology. This technology constitutes their FSA and allows them to compete successfully with other existing domestic firms that presumably have superior knowledge of domestic markets, consumer preferences, and business practices. The second reason is that the entry and presence of MNCs affiliates disturb the existing equilibrium in the market and forces domestic firms to take action to protect their market shares and profits. These reasons may generate different types of spillovers. One of these types is productivity spillovers. These take place when the entry of MNCs in the host economy leads to productivity or efficiency benefits in the domestic firms and the MNCs are not able to internalise the full value of these advantages.

In addition, the productivity spillovers may take place when the entry of MNCs leads to more severe competition in the host economy, which forces domestic firms to use existing technology and resources more efficiently. This kind of spillover may take place if the entry of MNCs raises the competition that forces domestic firms to search for new and more efficient technologies (Blomstrom and Kokko, 1998; Colen et al., 2008). Market access spillovers take place when the entry of MNCs in the host economy leads to improved access to export markets for domestic firms (Colen et al., 2008). MNCs have better organised management that allows them to manage international marketing, distribution, and overall production more effectively than domestic firms, particularly those in developing countries. MNCs can provide both knowledge of international market conditions and access to foreign marketing and distribution networks to domestic firms. MNCs, also, are often larger than domestic firms and may be able to fund the high fixed costs for development of transport, communications, and financial

services that are essential in encouraging export activities (Blomstrom and Kokko 1998). Another type of spillover effects is horizontal spillovers. These take place when MNCs formulate horizontal direct investment to produce overseas the same lines of goods as they produce in the home economy (Caves 1971). The entry of MNCs leads to increased productivity that promotes other firms within the same sector to recover their performance and competitiveness by adapting new technologies or by renting trained workers and managers from FDI firms. Therefore, horizontal spillover effects may occur when domestic firms are unable to catch up with the augmented performance of other firms within the same sector. This action may force domestic firms to reduce their market shares (Stancik 2007). MNCs are not likely to give the source of their competitive advantage away at zero cost. They will strive to limit horizontal spillovers (intra-industry) of productivity and market access advantages to compete with domestic firms.

Although, technology and knowledge are characterised by imperfect markets or known as public goods, thus spillover of technology and knowledge or trained labour to domestic competitors cannot be completely prevented (Colen et al., 2008).

Vertical spillovers (inter-industry) take place when MNCs formulate vertical direct investment to produce overseas a new good or with other inputs to their production process at host country as they produce at the home economy (Caves, 1971). Firms from sectors other than that of FDI firms might be affected by its presence also if they are in direct business contact with it through forward and backward linkages. This includes firms that supply or provide services for FDI firms, and firms that are supplied by FDI firms. In general, MNCs desire higher standards from their suppliers, and the higher standards are provided by FDI firms to domestic firms, which would improve the domestic firms' efficiency and performance (Stancik 2007). MNCs tend to prevent the transfer of technologies to host country competitors; they are likely to optionally increase the efficiency of domestic suppliers or customers through vertical input-output

linkages (Colen et al., 2008). Markusen (1995) argued that horizontal FDI, which means the foreign production of products and services approximately similar to those the firm produces for its home market, is more vital quantitatively than vertical FDI. Vertical FDI means fragmenting the production process geographically, by stages of production. This is because most FDI in production facilities seems to be horizontal in the sense that most of the output of foreign production affiliates is sold in the foreign country.

Similarly, Soreide (2001) pointed out that horizontal FDI is supposed to generate more positive spillover than vertical FDI, especially when MNCs supply a local market in the host economy. The weaker vertical FDI spillovers are due to the aim of the MNCs to use cheap labour and export the goods. In addition, the outsourced production technology fits in with the existing capabilities of the local workers, instead of upgrading them. Rodriguez-Clare (1996) illustrates that MNCs would affect the host economy through three important channels: 1) the transfer of technology; 2) the training of workers; and 3) the generation of linkages. However, empirical literature has suffered from the lack of identification of a formal concept of linkages. He formulates the concept of backward and forward linkages. There is assumed to be a mixture of inputs in the production of final goods, where domestic firms must purchase all of their inputs locally, and that the inputs are produced with increasing returns to scale. Through increasing demand for inputs, final-good firms help to make apparent a greater variety of specialised inputs, thus generating positive spillovers to other final-good producers. Rodriguez-Clare (1996) postulates three assumptions in the context of generation of industrial linkages: 1) a variety of specialised inputs enhances productivity; 2) the proximity of supplier and user is necessary for the production of intermediate goods; and, 3) the size of market limits the available variety of specialised inputs.

Rodriguez-Clare shows that a positive linkage effect is present in an increase of intermediate goods production, when the MNCs have a higher linkage effect contrasted to domestic firms.

This is in contrast to a negative linkage effect that might be present in a decrease in the productivity of domestic firms and a resulting decrease in wage levels.

UNCTAD (2001) reported that the host country that seeks to reap the benefit of FDI in terms of sustainable economic development would be able to create or improve production linkages between foreign affiliates and domestic firms. These linkages can take several forms, such as backward, forward or horizontal. Backward linkages take place when MNCs get hold of goods or services from domestic firms, and forward linkages when MNCs put to the market goods or services to domestic firms, while horizontal linkages are when MNCs interact with domestic firms engaged in competing activities. The report of UNCTAD (2001) also highlights the importance of backward linkages to domestic firms as well as foreign firms. The backward linkages of FDI are important for domestic firms because they can provide opportunities for production and employment by domestic suppliers. The importance of these linkages appears through the knowledge diffusion and skills that can assist in upgrading domestic suppliers, technological and managerial capabilities and market diversification, with spillover effects on the rest of the economy. However, these benefits depend on the markets in which MNCs operate, the incentives that they have, and on the capabilities of domestic firms. Furthermore, large MNCs can create risks for domestic suppliers in the form of anticompetitive practices, unequal bargaining positions and excessive dependence.

Productivity and market-access spillovers are in general complicated to distinguish empirically as they are set up through comparable externalities channels (Colen et al., 2008). Colen et al. (2008), following Gorg and Greenaway (2003) and Blomstrom and Kokko (1998), identify five channels through which spillover effects from FDI firms to domestic firms can take place: 1) imitation; 2) acquisition of human capital; 3) competition; 4) crowding-in and 5) export effects. Imitation means the broadcast method for new products and processes by the copying of products, technologies and production processes by domestic firms, regularly referred to as

reverse-engineering (Gorg and Greenaway, 2003; Colen et al., 2008). The imitation is dependent on the product or process complication in which FDI firms apply simple manufacturing products and processes. In addition, managerial and organisational innovations might be easier to imitate. Yet, the advance technology applied by FDI firms might not be imitated if the domestic firms do not have a certain level of technical skills. FDI can contribute to human capital formation through demanding and supplying skills (Colen et al., 2008). MNCs tend to invest in low wage developing countries. They are, however, likely to have a higher demand for relatively skilled labour in the host economy if they do not crowd out local demand for employment. They are also characterized by more skill-incentives than domestic firms (Gorg and Greenaway, 2003; Colen et al., 2008).

MNCs may also affect the supply side of skills by investing in training and the development of human capital. MNCs would set up R&D or education centres to develop domestic skills for their high-tech industries or business education (Colen et al., 2008). MNCs, in general, will invest in training and it is unfeasible to secure such resources completely with the lack of bonded labour. This in turn will generate productivity progress through the mobility of labour from FDI firms to domestic firms (Gorg and Greenaway, 2003). Colen et al. (2008) demonstrated that the motives of FDIs are crucial in determining the importance of worker training. For example, natural resource FDI is usually intensive and requires the training of only a small number of high skilled labours. Efficiency seeking FDI is usually low-skilled, low-wage labour and the need for training is limited. Additionally, strategic-asset seeking FDI requires specific skills relatively well-educated labour. Another type of motivation is market-seeking FDI, which would involve technological or marketing training of domestic labour to a limited extent. This type of spillover from the labour training and education investment would be horizontal or vertical. Horizontal spillovers take place through externalities or labour turnover. Labour that receives training at institutions supported by MNCs, may carry with them

knowledge of new technology or new management techniques to domestic firms. However, this type of spillover may appear after a long-time.

In contrast, vertical spillover effects through acquiring human capital would be more immediate. MNCs provide training to their domestic suppliers; such training and learning by downstream suppliers and upstream buyers may result in an immediate productivity gain (Colen et al., 2008). Therefore, training can create spillover directly through complementary workers and indirectly through the workers that carry with them knowledge and skills that is achieved at support training by MNCs (Gorg and Greenaway, 2003).

Another channel of spillover is competition and crowding in effects. Domestic firms may experience competition spillover from FDI at the time when MNCs set up their affiliates. Domestic firms that faced new or greater competition from FDI firms may have incentives for faster adoption of new technologies (Balsvik 2003). Domestic firms would be under pressure to use existing technology efficiencies or to invest in human capital, even if they are unable to imitate the MNC's technology or production processes (Gorg and Greenaway, 2003). Following Young (1993), Colen et al. (2008) argued that the innovations embodied in FDI would change the accumulation of old technologies, making domestic investment more productive. Additionally, the competition might increase the speed of adoption of new technology or the speed with which it is imitated (Gorg and Greenaway, 2003). A recent study by Chang and Xu (2008) used annual industrial survey database between 1998 and 2005 from Chinese industrial firms, finding that both spillover and competition effects from various groups of firms, whether foreign or domestic firms, affect firms in other groups in China, and the competition effects are more likely to outweigh spillover effects in regional markets than they are in national markets. In addition, the findings indicate that the competition effects are more likely to outweigh spillover effects among firms of similar resource types than they are among firms with distinct resource profiles. Besides, greater competition may cause the

crowding out of domestic firms and reduce domestic investment, resulting in reduced productivity of domestic firms. For instance, MNCs can reduce the market share of domestic firms by pushing up the average cost curves of domestic firms because MNCs have lower marginal costs due to some firm-specific advantages. This effect can offset the positive productivity spillover effects of increased competition (Aitken and Harrison, 1999; Balsvik 2003; Colen et al., 2008). The crowding-in effects are commonly known as the hypothesis of Crowding-out/in effect of FDI on DI. The crowding in effects of FDI can take place when FDI by foreign firms builds up new investment in downstream or upstream production that would not have taken place in their absence, particularly, when investment is carried out in undeveloped sectors of the economy. Meanwhile, the crowding out effects of FDI take place when FDI firms distort domestic firms and other foreign affiliates from undertaking investment by driving them out of business (Bende-Nabende and Slater, 2003).

The entry of MNCs may create competition that forces domestic firms to crowd out. FDI might stimulate DI and lead to the crowding in of domestic firms (Colen et al., 2008). Similarly, Borensztein et al. (1998) argued that the effects of FDI on domestic investment can be different; competing in product and financial markets MNCs may crowd out domestic firms; FDI may support the expansion of domestic firms by complementarity in production or by increasing productivity through the spillover of advance technology. The policy that offers special tax treatment and other incentives, such as export free zones and tax exemptions, to stimulate FDI inflows may introduce a distortion affecting domestic investment. This distortion could have a greater negative impact on domestic investment and limit growth spillover effects through crowding in effects of FDI (Borensztein et al., 1998; Colen et al., 2008). In addition, MNCs may affect domestic investment in host economies in two ways; directly through their own investment activities, and indirectly by affecting investment in the host economy firms (UNCTAD, 1999). Herzer et al. (2008) postulate that the positive knowledge spillovers, as

endogenous growth theory argued, cannot run from FDI to DI, especially in developing countries. For example, Gorg and Greenaway (2003) report that there is a positive spillover running from FDI to DI only in developed countries, not in developing countries, for several of the firm-level studies as in Aitken and Harrison (1999) for Venezuela. Gorg and Greenaway (2003), De Mello (1999) and Kim and Seo (2003) argued that MNCs may have firm-specific knowledge over domestic firms, that domestic firms have underdeveloped production technology and low skill workers. In addition, domestic firms may be unable to absorb the technological spillovers that may be restricted by undeveloped domestic product and financial markets (Apergis et al., 2006).

De Mello (1999) and Apergis et al. (2006) argued that FDI can affect DI through its effect on the profitability of domestic investors, which lead to crowding-out DI. FDI also can have an impact on the adjustment of the ownership structure of total investment in the host country and offers additional financial support for DI. This effect leads to crowding-in additional investment in the receiving countries. Additionally, Van Loo (1977) illustrates that FDI may affect domestic investment in the host economy through forward and backward linkages. For example, FDI firms might buy some product inputs from domestic firms that leads to an increase in the rate of return in this industry, and thus lead to an increase in investment in that industry. In contrast, FDI firms might induce production by providing lower cost inputs. Agosin and Meyer (2000) demonstrated that backward and forward linkages are necessary for crowding in effects but not a sufficient factor. For example, the presence of these linkages cannot prevent crowding out of domestic firms, particularly in the case where FDI firms simply displace existing firms. Also FDI can affect domestic investment indirectly through expenditure by means of the accelerator theory of investment. For instance, the changes in the relationship of expenditure to capacity generates changes in total investment, thus any changes

that FDI causes in the level of expenditure produces changes in domestic investment, which creates indirect effects on domestic investment (Van Loo, 1977).

The important assessment of the relationship between FDI and DI derives from several views. For example, a Schumpeterian view of FDI-related innovation as creative destruction through substitution may overlook the scope for complementarity between FDI and DI (De Mello, 1997). In addition, the endogenous growth theory view of FDI-led growth that FDI inflows have permanent effects on economic growth under constant returns to DI. This is because the increase in the stock of foreign-owned capital leads to a temporary increase in the output growth rate if diminishing returns prevail in the aggregate (Meyer, 2003).

The positive contribution of FDI to economic growth through DI requires that FDI crowds-in DI. FDI can decrease DI when FDI takes away investment opportunity of DI through licenses, skilled, credit facilities, which reflect the superiority of FDI over DI (Herzer et al., 2008). However, there have been some studies on this relation concluded that there was a strong relationship between FDI inflows and DI over time (Lipsey, 2000). FDI usually increases competition and this reduces market power, especially if the MNCs have established greenfield projects in a non-tradable goods sector. In a sector of tradable goods, the openness of the trade regime may be sufficient to generate competition. Acquisition entry does not increase competition, but it may affect the pattern of interaction between the competitors. Increased competition by foreign investors seems to push domestic firms toward the best practice limit in industries with low levels of technology, or goods that require the least advanced technologies (Meyer, 2003).

Similarly, foreign firms are theoretically expected to increase the efficiency of domestic firms via productivity spillovers (De Mello, 1997). However, the effect of entry foreign firms on the domestic firms, in the same industry, depends on the industry structure. The entry of foreign firms in the host country market may increase competition and force inefficient indigenous

firms to use existing technology more efficiently, or look for new technology, while the least efficient firms may be driven out of the market. The competition effect of FDI can lead to an increase and an update in the capital stock of DI, especially if the foreign investment operates in an underdeveloped sector or a sector where DI does not exist (De Mello 1999).

In addition, the domestic firms should be aware of adopting advanced technology to increase productivity as FDI may be able to increase the cost of production such as wages and the prices of local input supplies (Apergis et al., 2006). In contrast, if domestic firms are weak, foreign entry may improve their efficiency and motivate technological upgrading (Meyer, 2003). Besides, foreign firms may come to dominate the domestic industry, especially if the technological gap between them and the domestic competitors is large. In other words, imperfect competition can lead to reduced market share of domestic firms, especially if the technological gap is large and the labour force is not sufficiently qualified (Apergis et al., 2006). In addition, employees may lose their industry-specific investment (negative spillovers effects) notably if domestic firms are crowding out or are forced to cut production (leading to oligopolistic market). Foreign investment, therefore, may lead to reduced plant productivity, especially in the short-run (Aitken and Harrison, 1999; Herzer et al., 2008), although FDI entry can create labour income and a new demand for local inputs (Apergis et al., 2006).

Furthermore, DI can affect FDI in several ways. For example, increased investment in the physical and human infrastructure can lead to increased FDI profitability and then further enhancing FDI efficiency (Apergis et al., 2006). In addition, DI can act as a signal about the state of the investment climate, if the information is unavailable or incomplete in the host country (Apergis et al., 2006). In addition, Driffield and Love (2003) examine the assumption that foreign firms investing in the host country are able to capture spillover effects from domestic firms. They looked at the possibility of spillover effects from domestic firms to foreign firms by applying a panel of UK manufacturing industries. They found that technology

generated by the domestic sector drifts out to foreign multinational enterprises (MNEs), though this effect is limited to relatively R&D concentrated sectors. There is also evidence that these spillover effects are affected by the spatial concentration of industry, and that learning-by-doing effects are restricted to sectors in which technology sourcing is unlikely to be a motivating influence. The indirect channel of productivity spillover effects would be passing through export effects. FDI, in general, tends to generate positive spillover to the host economy and then improve the export performance of domestic firms (Nguyen, 2008). Also the export spillover effects are dependent on the characteristics of domestic firms, industries and the host economy. These characteristics are known as absorptive capacity such as human capital, financial market development and technology gap (Nguyen 2008).

The presence of FDI firms may promote export activities of domestic firms in the same industry, and then generate positive spillovers to the host economy through horizontal linkages. FDI would also effect export activities of domestic firms in upstream and downstream industries via vertical linkages, which are assumed to be a more important source for export spillover from FDI (Nguyen, 2008). Aitken et al. (1997) pointed out that the export spillover effects can take place when MNCs link domestic suppliers and sub-contractors to foreign markets through improved transportation infrastructure or improved access to information about which goods are preferred amongst foreign consumers. Therefore, MNCs can generate export spillover to the host economy through the fact that FDI firms have a multi-market presence., Thus MNCs are a natural channel for transferring information about foreign markets, foreign consumers and foreign technology to domestic firms, and they provide channels through which domestic firms would distribute their products. Aitken et al. (1997) illustrate that the export activities of MNCs often produce externalities from spillover to domestic firms, enhancing the export prospects of these firms.

Aitken et al. (1997) applied panel data on 2104 Mexican manufacturing plants for the period 1986 to 1990. They found that MNCs tend to generate positive export spillover effects to domestic firms but not from general export activity. This suggests that export spillovers are limited to MNCs activity. Using panel firm level data in the UK, Greenaway et al. (2004) found that MNCs exporting has a positive effect on domestic firms' productivity for current exports. Girma et al. (2008) found that there is no evidence on the positive productivity spillover from MNCs in the same industries (horizontal spillover), upstream or downstream industries towards either exporting or non-exporting firms by using panel firm-level data from UK manufacturing industries from 1992 to 1999. In addition, the results show evidence for negative vertical spillover for domestic non-exporters.

This study employs endogenous growth theory as part of the theoretical framework of this study. The implication of endogenous growth theories and the role of FDI impact is directly linked to the role of capital investment in the creation and diffusion of technology, human capital development, and market competition. Johnson (2006), using a panel of 90 countries and by performing both panel and cross-section analysis, found that FDI inflows improve economic growth in developing economies, but not in developed economies. Piana (2001) defined investment as the value of machinery, plants, and buildings that are bought by firms for production purposes.

Since FDI has been identified as a tool for economic development and growth in both developed and developing nations (Ayanwale, 2007a), then it is necessary for the purposes of this research study to identify what the determinant factors are and opportunities of FDI in a typical host country. According to Colen et al. (2008) FDI bring about advance level of technological capability and managerial know-how that could simulate higher levels of efficiency and productivity. Hence for this study, it is hypothesized that:

H4:

Inward oil and gas FDI is positively related to economic growth in Nigeria.

H4a:

OECD countries' oil and gas FDI has a positive impact on economic growth in Nigeria.

H4b:

Non-OECD countries' oil and gas FDI has a positive impact on economic growth in Nigeria.

Other Factors That Could Also Influence Economic Growth

According to Kurtishi-Kastrati (2013), economic growth is an all-inclusive concept that relates to several other factors, for example: human capital, trade openness, technology, domestic investment and institutional quality. Borensztein et al. (1998) after examining 69 developing countries with a cross-section of data, found that FDI has a positive effect on economic growth but the effect depends on the quality of host country human capital.

Akinlo (2004) reported a positive effect of education on economic growth proxied by the ratio of secondary and tertiary institution enrolment. Wei et al. (2001) in a study of regional economic growth found a negative coefficient of population on regional economic growth, while human capital has a positive effect. The FDI's interaction with human capital has received considerable attention. Borensztein and Lee (1998) found in a cross-country regression framework for 69 less-developed countries in the period from 1970 to 89, that inward FDI has positive effects on growth through its interaction with human capital. FDI contributed more to growth than domestic investment and it also had the effect of increasing domestic investment. According to them, it should be noted that growth equations are extremely sensitive to proxies of human capital.

In a panel data framework for a sample of 18 Latin American countries for the period 1970 to 1999, Bengoa and Sanchez-Robles (2003) stated that in order for a positive effect from FDI to be achieved, the country must have an adequate level of economic stability, and liberalized

capital markets, as well as human capital. Li and Liu (2005) in a panel data analysis for 84 countries over the period 1970 to 1999 found that FDI affects growth directly and also indirectly through its interaction with human capital. Regarding the complementarity between domestic and foreign investment, Kentor (1998) calculated foreign capital dependence and showed that countries with a relatively high dependence on foreign capital exhibit slower economic growth than less-dependent countries for the years 1940 to 1990, which also supported the earlier findings of Dixon and Boswell (1996). Vu et.al (2007) attempted to prove the importance of FDI to host economies. They selected two large FDI recipients in Asia: China and Vietnam during 1990 to 2003 to examine FDI effects on growth. The authors collected the data from five sectors: industry, construction, transportation, real estate, and the agricultural sector, and estimated the model by panel data estimation. The researchers suggested that the FDI effects to host country growth are through labour-augmenting technical transfers. Hence, the model is derived from an augment Cobb-Douglas productions function including labour transfer effect and human capital variables. The results indicated that FDI has a positive impact on economic growth for both China and Vietnam. Interestingly, the effect is stronger when including the interaction variable between FDI and host labour. Johnson (2005) applied growth theories to study the relationship between FDI and economic growth. This study employed a large data set of 90 host countries during 1980 to 2002. The exogenous variables consisted of capital accumulation, labour, FDI and average years of schooling as a proxy of human capital. The model also includes the regional dummies and an interaction variable (FDI and schooling). The empirical results indicated FDI enhances the economic growth of host economies. Borensztein et.al (1998) analyzed how FDI affects economic growth for 69 host developing countries from 1970 to 1989. The endogenous growth theory was applied to measure the FDI effect. It provided the framework to study the link between host economic growth and FDI with other important growth factors. The authors hypothesized that the technology progress is

the major factor of the long term growth. The model employed exogenous variables such as government consumption, FDI, inflation rate, regional dummy variables, and some variables representing institution. In addition, the male secondary schooling as a proxy of human capital and its interaction with FDI were introduced in the model. The results were consistent with their hypothesis, indicating FDI has a positive impact on economic growth. Essentially, the effect is stronger after including the interaction between FDI and human capital. Consequently, the authors suggested that the flow of technological progress from FDI enhances host economic growth. However, the size of the impact is determined by the human capital stock of host economies. Hence for this study, it is hypothesized that:

H5: Human capital development has positive effects on economic growth in Nigeria.

Basu et al (2003) using a panel of 23 countries, found a co-integrated relationship between FDI and GDP growth, and thus, emphasised that trade openness is a crucial determinant of the impact of FDI on growth in open economies, both in the short and the long run, whereas the long run causality is unidirectional from GDP growth to FDI in relatively closed economies. Balasubramanyam et al. (1996) in a study of 46 developing countries with a cross-section data found that FDI has positive spillover effects on economic growth but the magnitude is affected by host country trade policy. FDI is expected to promote competitiveness in the host location, encourage more export and import, may also generate foreign exchange in turn will have a multiplier effect on GDP.

Adenugba and Sotubo (2013) provide a satisfactory explanation of exportation as a tool for economic growth. It is implied that exportation is a crucial requirement for the assurance of sustainable growth and economic development of an economy. Any country that intends to generate huge wealth and revenue therefore needs to implement policies that help support and encourage exportation for the sole purpose of economic growth and development since exportation is unarguably a catalyst for economic development in all its ramifications (Abou-

Strait, 2005 in Adenugba and Sotubo, 2013). Literature has also proven the fact that foreign trade is an essential ingredient in generating inflow of foreign capital which definitely has a drastic impact on an economy (Adenugba and Sotubo, 2013). This foreign capital inflow leads to an increase in a country's earnings ~~thus improving the national income of a country~~. Exportation has immense significance, creating avenues for employment since an economy that highly demands exportation requires more output. Another apparent benefit is the reality of a reasonable equilibrium between import and export which is known as balance of trade and also the position of payment provided the country in question engages more in exports than imports. Export trade literature has proven the fact that developing economies such as Nigeria need foreign capital to bring about rapid development. Therefore, measures must be put in place to attract foreign capital. Such measures must provide a blue print to a diversified export in order to achieve the desired capital that will in turn boom the economy. Buttressing this, Adenugba and Sotubo (2013) were of the view that foreign trade is paramount for a nation's economic growth and sustainable development. Adenugba and Sotubo (2013) also observe that export trade is a major prerequisite for productivity and growth. The practicality of this has helped shaped the economy of many nations and set them on the path to achieve economic growth and development. This has informed Nigerian policy makers to adopt those policies that bring about export-led growth and neglect import substitution policies. These adopted policies gives room for exportation via the process of removing embargos that affect the free movement of the factors of production (Todaro and Smith, 2011; Adenugba and Sotubo, 2013). Abou-Strait (2005) and Adenugba and Sotubo (2013) suggests that the export-led growth strategy is capable of providing manufacturers with zeal and incentives to engage in the process of exporting their manufactured products via various economic policies. These strategies are designed to bring about an increase in the output of the country which will bring about an increase in the volume of the goods the country exports.

Emeka, Frederick and Peter (2012) and Azeez et al. (2014) evaluated the role of trade on Nigeria's economy for the period 1970 to 2008 by applying a combination of bi-variate and multivariate models, the relationships between the selected macroeconomic variables were estimated. The findings indicated that exports and FDI inflows have positive and significant impact on economic growth. The study suggested that there should be congruence of exports and fiscal policies, towards a greater diversification of non-oil exports by the Nigerian government in order to attain the desired growth prospects of external trade (Azeez et al., 2014). The study by Mousley et al. (2009) examined the impact of fiscal incentives in Nigeria. They realized that the efficacy of tax holidays is limited because tax holidays are only awarded after substantial capital has been committed by the investors. As a result of this, it is difficult to ascertain if tax holidays affects investment because it is only awarded after the investor has committed capital. They criticized the system of fiscal incentives in Nigeria as too complex and inefficient, counteracting the very essence of incentives, which is to provide a supportive environment for business. Nigeria's systems of fiscal incentives have evolved over the years and three distinct phases can be recognized. Firstly, from the late 1940s until the early 1980s incentives took the form of investment tax credits, tax holidays and accelerated depreciation. Following this period, incentives in the late 1980s were in the form of export development while more recently from the early 1990s, incentives have been for export processing zones.

The government also has a role in promulgating policies that help encourage and enhance the production output of the home industries so as to exceed the domestic demand so that the surplus can be sold in the international market for the sake of garnering wealth by earning foreign exchange. The promotion of export involves embracing and supporting domestic production for the purpose of exportation which is done by providing incentives for the home producers. These incentives come in various ways, such as: tax reductions, subsidies, finding markets for local products, provision of loans and grants, among others. However, one should

take note that this strategy of promoting export is largely bent on diversification and the expansion of domestic products (products that were traditionally produced for domestic consumption) (Dunn Jr. and Mutti, 2004; Adenugba and Sotubo, 2013). Studies like (Dunn and Mutti, 2004; Adenugba and Sotubo, 2013) agree that developing countries that ran with the vision of supporting exportation have had a speedy economic growth compared to those countries that promulgated policies of protectionism. These countries that experienced an immense growth in their economy based on their export-led policies are known as the Four Asian Tigers: South Korea, Taiwan, Hong Kong and Singapore. It is also important to note four other Asian countries that sprang up after following the footsteps of the Asian Tigers: China, Thailand, Malaysia and Indonesia. In contemporary times, countries like Mexico, Brazil and India are also seen as economic giants based on adopting same approach as the previous countries. For this study, it is hypothesized that:

H6: Trade openness has positive effects on economic growth in Nigeria.

Infrastructure relates to physical and non-physical systems provide by public institutions to facilitate business operations and society. The quality of host location infrastructure could influence FDI inflows (Asiedu, 2006). Ang (2008) argued that the provision of infrastructural support could raise the productivity of capital, and expand the overall resource availability by increasing output. Asiedu (2006) found that 132 countries with good infrastructures attract FDI in SSA. Udoh and Egwaikhede (2008), in their study of FDI in Nigeria between 1970 and 2005, found that infrastructural developments (appropriation size of government spending) are a crucial determinant of FDI inflows into the Nigerian economy. Wheeler and Mody (1992) argued that the quality of infrastructure reduced operating costs, facilitated production and thereby promoted FDI. Hence, good infrastructure should increase productivity which in turns promotes economic growth. Easterly and Rebelo (1993) revealed that public expenditure on communications infrastructures significantly raised growth. Fay and Perotti (1994) found a

positive effect of telephones on economic growth. Lopez (2004) found that infrastructure raises growth and reduces income inequality. Easterly (2001) reported that telephone density contributes significantly to explain the growth performance of developing countries.

Zhang (2001) argued that the motivation of FDI is also necessary in explaining the hypothesis of Growth-driven FDI. For instance, market-seeking FDI occurs when MNCs establish enterprises in other countries. This motivation is induced by market access to the host economy for efficient utilisation of resources and exploitation of economies of scale.

Another motivation of FDI is export-oriented FDI incentivised by factor-price differentials, such as low wages or cheaper labour, along with human capital and infrastructure conditions. Therefore, growing market size, and improving conditions in human capital and infrastructures are necessary for attracting FDI, and this results in growth-driven FDI. In other words, the market size of the host economy (as measured by GDP) acts as a factor that encourages MNCs to raise their investment in the host economy (Zhang 2001). The high level of aggregate demand, which is induced by the speed of economic growth, leads to stimulating higher demand for investments, thus attracting more FDI. For capturing the growth enhancing effects of FDI, economies should offer a supportive business environment and must have reached minimum level of economic development. This reflects the hypothesis that higher economic growth causes or induces higher or more FDI inflows (Nunnenkamp and Spatz 2004). For this study, it is hypothesized that:

H7: Infrastructure has positive effects on economic growth in Nigeria.

Nigeria is the largest recipient of remittances in SSA (Hernandez-Coss and Bun, 2006). Some researchers also enlisted economic circumstances prevalent in home country, wage, exchange and inflation rates, socio-political, socio-economic and legal environment, cultural and emotional attachments etc as factors of great concern. The Nigerian environment is

characterized by a very unstable political environment, low level of education, numerous obsolete tax laws without machineries on the ground for enforcing compliance and many other critical macroeconomic issues. Historically, the largest beneficiary of FDI in Nigeria is the oil and gas sector. Over the years, this industry in Nigeria has witnessed investments by international oil companies (IOCs). This has created opportunities for indigenous oil companies to participate in the upstream sector of the industry. However, due to the high costs involved, a number of indigenous companies have relied on FDI to fund their acquisitions of these upstream assets, mostly through international equity inflows. Factors that may impact FDI in the short- and medium-term include political stability as investors may seek to step down funding with a change in government in Nigeria in May 2015. Also to be considered is the impact of falling oil prices, and the proposed changes in the regulatory framework in the oil and gas sector. However, considering the huge potential of the Nigerian economy emphasising the rebasing of Nigerian GDP as the largest economy in Africa and the dearth of infrastructure that requires substantial investment, the long-term outlook remains positive for FDI in Nigeria. Oil-rich Nigeria has been faced with poor macroeconomic management, political instability, inadequate infrastructure and corruption, which have hindered economic growth and development. The Nigerian Government was interested in improving all these areas and flagged a project of economic reforms in order to meet its target of becoming the world's top 20 economies by 2020, nationally known as vision 2020. This also led to an interest in attracting FDI as a means of achieving economic growth. On this basis, significant economic growth is predicted as against its previous mediocre performances.

Furthermore, as part of efforts to improve the level of FDI attraction, the Nigerian Investment Promotion Commission (NIPC) was established in 1995 among the macro-economic programmes adopted, aimed at improving the level of security and to liberalize the investment climate. The Commission was designed to encourage FDI inflow and was largely successful in

that regard; even though it was not sustainable due to political instabilities in the country. An area that clearly captures the level of instability is the unrest in the Niger delta region which remains an important challenge for policymakers now and in the future. So many reasons account for such instability in the region, for instance, after 60 years of oil exploitation in the Niger delta, widespread poverty remains in the region, causing discontent and the breakdown of social capital. In a sense, residents of the delta have been let down by their governments and oil companies alike.

It is, however, important to separate the genuine concerns of Niger delta residents from those of criminal gangs exploiting the prevailing situation. For example, vandalization of oil pipelines by militants is a counterproductive exercise. By disrupting total exports of crude, there is less revenue earned for the nation and, consequently, less financial allocation to their states. the very situation which some militants claim they want to reverse. Kidnappings are also counterproductive, frightening away investments not only from the oil sector but also from other potential sectors of the Nigerian economy.

The federal government is already supporting the Niger delta with targeted investments by the Niger Delta Development Commission (NDDC), building a new university and supporting local schools, and constructing the East-West highway linking various Niger delta states. Youth employment opportunities are also being improved, with indigenes from the region being given preferential treatment for jobs in the military and police service.

De Mello (1999), using both time series and panel data fixed-effects estimations for a sample of 32 developed and developing countries, found that the effect of FDI on economic growth is stronger for host countries with a higher level of institutional capability measured by the degree of property rights protection and bureaucratic efficiency in the host country. Another measure for institutional quality is the level of political stability; Political stability is usually measured by the probability of a change of government, as well as political violence as measured by the

sum of frequency of political assassinations, violent riots and politically motivated strikes (Ayanwale, 2007). It is widely acknowledged that when a country is politically unstable its economic growth is hindered (Ayanwale, 2007).

H8: Political instability has negative effects on economic growth in Nigeria.

4.4 Chapter Summary

This chapter provides an extensive literature review on the impact of oil and gas FDI on economic growth. In the literature reviewed, it is observed that oil and gas FDI is favoured by the host locations as a result of positive potential spillover that in turn stimulate economic growth. Some authors however argued that inflows of FDI are not always accompanied by advanced technologies. The channel in which FDI potentially boosts economic growth is through “crowding in” effects on domestic investments which ultimately create positive “spillover effects” of technology transfer, knowledge and human capital development on domestic firms (Onyali and Okafor, 2014).

The study hypotheses were developed on the preposition that oil and gas FDI's effect on economic growth is dependent on the technological capabilities of other home countries (OECD vs non-OECD). The next chapter will provide an extensive review of literature on the impact of Oil and gas FDI on Nigeria's export performance with a view to developing the conceptual and analytical framework of this study.

5.0 Chapter Five: Literature Review on the Impact of Oil and Gas FDI on Nigeria's Export performance

5.1 Introduction

The purpose of this chapter is to examine the impact of FDI on export performance in Nigeria. Export is viewed as an engine of economic growth (Zhang, 2005). There is a widely shared view that FDI promotes exports of host countries by augmenting domestic capital for exports, transfer of new technology, establishing new products for exports, facilitating access to new and large foreign markets (Greenway et al., 2004; Kneller and Pisu, 2007). Although, FDI has its own drawbacks, for example; the potential to lower or replace domestic savings and investment (i.e. crowding-in or crowding-out effects); or transfer of technologies that are of low level or inappropriate for the host country; target primarily the host country's domestic market and thus, inhibit the expansion of indigenous firms that might become exporters; and not help developing the host country's dynamic comparative advantages by focusing solely on local cheap labour and raw materials (Zhang, 2005).

However, empirical literature on FDI-export performance nexus have shown that not in every host location nor in every industry does FDI contribute to export performance (Greenway et al., 2004; Kneller and Pisu, 2007). The consensus is that the effects of inward FDI on export growth of the host country may take place both directly and indirectly. The direct effects arise when MNCs, establish production affiliates in the host country as platforms to make exports to the home country or third countries. This export-oriented FDI seeks to exploit the comparative advantages of the host country due to differences in factor intensities between the host and home countries. For example, Greenway et al. (2004) and Kneller and Pisu (2007) opined that MNC, especially those who are export-oriented, appear to instigate positive export spillover and may increase the probability of exporting for domestically owned firms operating

in the same industry (Bhaduri and Ray, 2004; Kugler, 2006; Adjasi and Hayford, 2008; Eryigit, 2012). These authors argued that FDIs promote exports of host countries by augmenting domestic capital for exports. In parallel to this, some studies have failed to find any empirical evidence between FDI and export performance. For example, Barrios et al. (2003) in the case of Spain, Ruane and Sutherlands (2004) in the case of Ireland, all failed to find a statistically significant relationship between inflows of FDI and exports. Kuntluru et al. (2012) in the case of India, observed a negative relationship between FDI inflow and Pharmaceutical Exports.

Studies on FDI-export nexus in Nigeria context have also found similar mixed results. Enimola (2011) using Granger – causality analysis - revealed unidirectional causality running from FDI to export; real exchange rate to export; trade balance to export and bidirectional causality from external market indicator to export.

Olayiwola and Okodua (2013) examined the contribution of FDI to the performance of non-oil exports in Nigeria and also revealed a unidirectional causality runs from FDI to non-oil exports. Aigheyisi (2015) investigated the effects of import penetration and FDI inflows on the performance of Nigeria's non-oil exports in the period from 1981 to 2012. The study revealed that the short run and long run impacts of FDI on non-oil export performance were not statistically significant. Babatunde (2017) examined the relationship between inward FDI and export performance in Nigeria. Empirical analysis revealed a positive and significant impact of FDI on total export and exports in the manufacturing, oil and services sectors. The study also found that FDI does not have any significant relationship with agricultural exports.

From the empirical studies above, it can be deduced that the mixed results could be attributed to different samples and methodological approaches used by prior studies. In the case of Nigeria for example, Enimola (2011), Olayiwola and Okodua (2013), Aigheyisi (2015) and Babatunde (2017) examined general FDI to industry specific export performance using time series analysis. Apart from the study by Babatunde (2017) conducting a time series analysis to

examine the impact of aggregate FDI on export in manufacturing, oil and services and agricultural sectors, no other empirical studies have examined FDI-export nexus in the Nigeria oil and gas sector. In order to build on existing studies, this study will employ panel data analysis to examine the impact of FDI in oil and gas sector on Nigeria's export performance. The export performance will be measured using two indicators, unlike previous studies: which include, aggregate export, and export in oil and gas. Using these indicators will provide empirical evidence on the role of FDI in promoting export in Nigeria and the oil and gas sector. Also, applying panel data analysis allows the use of much richer models and estimation methods. Panel data capture variation in cross-section overtime of observed units (Greene, 1997; Wooldridge, 2010; William, 2013).

5.2 Definition of Key Operational Terms

Before providing a comprehensive review of export trade in Nigeria, it is paramount to have a vivid understanding of what trade means. Trade means the action of buying and selling (Oluwagbemiga and Alabi, 2017). Trade may also be referred to as the business transaction between a seller and a buyer. This business transaction is characterized by mutual benefits to make monetary gain like profit (Azeez et al., 2014). To the seller, making profit would be the sole benefit while, to the buyer the sole benefit is to gain satisfaction. The trade between two trading partners or traders is known as a bi-lateral trade. The trade that transpires between more than two trading partners or entities is referred to as multi-lateral trade (Oluwagbemiga and Alabi, 2017).

According to Dollar and Kraay (2004) trade exists due to the reality of specialization and division of labour for the purpose of meeting needs and acquiring other commodities (Oluwagbemiga and Alabi, 2017). The term export trade relates to those goods and services sold by an organisation or individual to another organisation or individual outside its geographical location (Li, Chen and San, 2010; Oluwagbemiga and Alabi, 2017). This

organisation or individual could also be a company, state enterprise or a country. Joshi (2005) described export trade as those goods and services shipped or transported from suppliers' borders to consumer destinations. International trade on the other hand refers to the processes of importation and exportation that transcends foreign borders (Oluwagbemiga and Alabi, 2017). Azeez et al. (2014) explained that international trade can be interchangeably referred to as foreign trade or global trade. Hence, international trade encompasses the inflow (import) and outflow (export) of goods and services between two countries.

5.3 Theories of Foreign Trade

Absolute Advantage Model

The theory of Absolute Advantage was propounded by Smith in 1776 in his publication *An Inquiry into the Nature and Causes of the Wealth of Nations*. According to Adenugba and Sotubo (2013), this theory uses a two by two by two model, i.e. there are two countries involved in the trading of two commodities and using only two factors of production; labour and capital. The theory says that a country should export products in which it is more productive or efficient than other countries it is in trade relations with. This means that goods in which it has an absolute advantage may be produced more per unit of input than others in which it has no absolute advantage, while importing those goods where it is less productive from other countries (Adenugba and Sotubo, 2013). Absolute advantage means the ability of a country to produce a larger quantity of a good with the same amount of resources as another country. The country's absolute advantage may be due to the nature of its resources or to its production skills (Adenugba and Sotubo, 2013). The theory also proposed that each nation could benefit from trade by specializing in the production of the good that it produces at a lower cost than the other nations and then importing those good that it produces at a higher cost. Hence, specialisation will increase the world output and the gains from trade (Adenugba and Sotubo, 2013). Absolute advantage theory also proposed that foreign trade is a positive-sum game, because both

countries involved will benefit from the trade. Thus, a nation need not gain at the expense of other nation, as all nations could gain simultaneously (Adenugba and Sotubo, 2013). However, the absolute advantage theory has its limitations. For example, the question does arise that should trade still take place when one partner can produce both commodities more efficiently than the other partner? The theory failed to answer this question satisfactorily thus, giving rise to Ricardo's theory of Comparative Advantage." (Adenugba and Sotubo, 2013).

The Theory of Comparative Advantage

The theory of comparative advantage is credited to Ricardo who propounded it in 1817 after a thorough perusal of Smith's work. Ricardo was not satisfied with the vagueness of Smith's theory (Adenugba and Sotudo, 2013). Thus, filling the lacunar, Adenugba and Sotudo (2013) explained that according to Ricardo's theory of comparative advantage, even if a nation has an absolute cost disadvantage in the production of both goods compared to other nations, there would still exist a basis for mutually beneficial trade. The theory proposed that less efficient nations should specialize in the production and exportation of the goods in which it is relatively less inefficient (where its absolute disadvantage is least). More efficient nations should specialize in the production and exportation of the goods in which it is relatively more efficient (where its absolute advantage is greatest). This theory proved to be better than Smith's absolute advantage theory because it is possible for a nation not to have an absolute advantage in anything but not possible for one nation to have a comparative advantage in everything or the other nation to have a comparative advantage in nothing. However, because comparative advantage depends on relative costs (Carbaugh, 2004 in Adenugba and Sotubo, 2013).

Therefore, for the purpose of this work, the Ricardian theory of comparative advantage will be used in explaining a non-oil export commodity. The theory of comparative advantage is picked above the absolute advantage theory of Smith because, it is evident that Nigeria has an absolute advantage of exporting crude oil to nations with an absolute disadvantage of crude oil but since

crude oil price has the disadvantage of fluctuating in the global market and the economy of Nigeria is solely dependent on it, it is wise to look beyond oil exports which definitely will diversify the economy and save her from the pangs of mono-culture. In the process of looking beyond oil export for non-oil export commodities, the theory of comparative advantage comes in to play, in that those non-oil commodities of which Nigeria has a comparative advantage or those commodities in which Nigeria can produce efficiently or those commodities in which a low cost of production generates a massive output compared to other countries' should be looked into and measures set in motion to set them on a course of exportation.

The framework of analysis is based on the theory of Comparative Advantage which was propounded by Ricardo in 1817 as a counter to Smith's theory of Absolute advantage. Since this theory talks about the ability of a country to produce those products in which it has a low marginal cost or opportunity cost compared to other countries, this theory was preferred to the theory of Absolute advantage since a country could have more than one commodity in which it has an absolute advantage over other countries it is in trade relations with. Smith's argument was based on one commodity in which a state has high efficiency in producing while Ricardo's theory of comparative advantage answers the question - 'what if that country has more than one commodity in which it has high efficiency in producing?' Since Nigeria potentially has the ability to efficiently produce different finished product of the natural crude oil amidst other commodities as against her African counterparts. This is solely the reason why this theory was chosen in explaining this work (Maneschi, 1998). As old as this theory is, it is the most popular in International trade literature and despite scholarly critic as against its benefits. According to Chang (2007) Ricardo's theory is absolutely right, because it is better for countries to specialize in things that they are relatively better at. From a keen observation, it is noticed that Ricardo's theory of absolute advantage provides room for diversity in that if the price of one commodity

collapses in the international market, other commodities with strong comparative advantages could serve as absorber for the country's economy.

Comparative advantage tradition relies on constant return to scale which is irrelevant to the fast-global trade transactions. The world trade volume is more concentrated between economies of similar size and technology something which omits the relevance of trade explained by the comparative advantage tradition.

Today trade between dissimilar economies accounts for a very small percentage of the total global transactions. For countries transacting in similar types of products, taste and preference matters a lot in explaining the pattern of trade, rather than comparative advantage. The assumption that countries will produce and trade dissimilar products only is not a reality anymore. Whilst Intra-industry trade theories have failed to explain the current trend and patterns of international trade, they contain an explanation that is relevant to international trade; they only fail to explain the modern issues in international trade. Over time there have been a number of modern international trade theories that have emerged that take account of such factors as government involvement and regulation not considered in comparative advantage model (Morgan and Katsikeas, 1997). Explanations that these theories fail to justify are the fact that this increase has been seen especially within industrialised countries which has received almost the same level of economic development. Explanations were developed in late 1970's and 1980's by researchers such as Helpman (1981), Krugman (1979) and Lancaster (1980) in order to account for some facts like the increased ratio of global trade to GDP, and trade being more concentrated among industrialised countries and the fact that trade among industrialised countries is largely intra-industry trade (Bergoeing et al., 2001; Helpman, 1981; Krugman, 1979). According to the report by Bergoeing et al. (2001) for the period from 1961 to 1990, the ratio of trade to GDP within the OECD countries increased faster (from 5.3% in 1961 to 11.2% in 1990) than that of trade to GDP worldwide. The new trade theories or intra-industry theories

were specifically developed to explain these facts particularly by introducing the concepts of economies of scale and imperfect competition.

Another limitation of the comparative advantage model is that it depends on perfect competition where markets have many buyers and sellers as well as trade in homogeneous products, intra-industry trade theories rely on imperfect competition. Trade between two imperfectly competitive economies with identical tastes, technology and factor endowment is mutually beneficial through increasing returns to scale (Krugman, 1980). Imperfect competition may take a form of monopoly (a market with only one seller); or oligopoly where few sellers operate the market. These give rise to two kinds of models under intra-industry trade that can explain international trade taking place in similar economies. The literature presents these two types of models as ‘large numbers’ and ‘small numbers’ explanations of intra-industry trade (Bernhofen, 1999). The former explanation is based under monopolistic competition, while the later provides a homogeneous-product explanation of intra-industry trade in segmented duopolistic markets. Hence, the large and small connotes the number of firms under each kind of market. In essence a distinguishing feature between the two kinds of market is that a firm under monopoly earns higher profits than collective firm’s profits in a perfectly competitive market; but it sells less of the goods at a higher price than a perfectly competitive market. On the other hand the firms under oligopoly earn higher profits, charge higher prices and sell a smaller quantity than in a perfectly competitive market while earning lower combined profits, charging lower prices and selling higher volumes than would a monopoly (Webster, 2000). Therefore, intra-industry trade explanation is viewed through two lens; trade resulting from consumers’ preferences for varieties (monopolistic market) and trade resulting from rivalry of oligopolistic firms.

However, the essence of the comparative advantage theory is based on the fact that participation in international trade is not just the act of exchanging goods, but rather the

consequence for production in both countries (Webster, 2000). The theory is criticised on the grounds of its assumptions which cannot explain the many transactions that dominate today's global trade. Krugman et al. (2012) points out some other shortfalls of the model; first the model expects an extreme degree of specialisation that is not there in the real world. Second, the model does not consider the fact that international trade has an effect on the distribution of income within countries, consequently the gains from trade cannot be said to be enjoyed equally for the country as a whole. Third, the model misses an important aspect in the trading system, the role of differences in resources among countries; it only considers the role of labour productivity as being the cause of trade between countries. Fourth, it does not consider the role of economies of scale as being the cause for countries to trade between each other; thus leaving it unable to explain why large trade flows exist between apparently similar countries like Canada and USA for instance. As limited as it is, the comparative advantage theory provides a good explanation of quite a good number of international trade transactions taking place especially between developed countries and developing countries. This is based on the fact that the two have dissimilar levels of economic productivity. Comparative theory does not explain how the differences in costs of production and prices of production factors arise, it just suggests that such differences are the cause of the necessity of specialization and hence international trade (Robock and Simmonds, 1989).

Factor Proportion Theory

Factor Proportion theory takes that as its focal point, and attributes differences in comparative costs to factor endowment differences among countries. Factor Proportion theory put great emphasis on the interchange between the proportions in which different factors of production are available in different countries and the proportions in which they are used in producing different goods (Krugman et al., 2012; Krugman and Obstfeld, 2003; Webster, 2000). The theory asserts that trade patterns in the world are explained by the differences in factor costs

which differ across countries. It relates the bilateral trade flows between countries to differentials in their endowments (Baskaran et al., 2010). Factor costs differences result from the differences in countries' endowments of one factor relative to their endowment in other factors.

In a country where labour is abundant relative to land and capital, labour costs would be lower as compared to land and capital. Conversely, if labour were to be scarce, then it would be more expensive as compared to land costs and capital costs. According to this theory, it could be expected that countries would outshine in the production and exportation of products which use their factor of production which is relatively less costly as compared to some other factors (Daniels and Radebaugh, 1995). Consequently countries will be importing those commodities which require factors with which they are poorly endowed. Such specialisation would lower their production costs while gaining from trade. Hence the theory predicts that a country tends to be a net exporter of those goods that require factors with which they are abundantly endowed; whereas being net importers of those goods requiring factors with which they are poorly endowed (Baskaran et al., 2010; Wood and Mayer, 2001). This is because differences among countries on their factor endowment give rise to differences in the relative production costs between countries; while the differences in relative production cost gives rise to differences in pre trade prices and consequently generate trade between economies (Webster, 2000).

It can be seen here that this theory makes a continuation of the concept of comparative advantage by considering factor endowments and the costs of production, and probably is the most influential model of comparative advantage.

According to Krugman et al. (2012), it considers comparative advantage as being as a result of the interaction between countries' resources (the relative abundance of factors of production) and the technology of production (which influences the relative intensity with which different factors of production are used in the production of different goods). The abundance in this

theory is explained in relative terms rather than absolute; it is by comparing the ratio of one factor of production to another in both countries.

Though empirical tests tend to reject this model (Baskaran et al., 2010), it remains the most logical and appealing theory for explaining the causal observation in global production and exports, particularly in the case of dissimilar economies; for example, Hong Kong, the most densely populated area in the world, where there are more people than the amount of land. In the 1960s and 1970s, the most successful industries were those that used a technology which required little land as compared to the number of people. It has for a long time specialised in the production of clothing which was housed in multi-storey factories where workers would share minimal space. Space limit could not allow her to compete in the production of automobiles for instance, as they require much more space per worker (Daniels and Radebaugh, 1995). Faced with increased land rents and labour costs in 1980's, Japan shifted most of her labour intensive factories to mainland China, where there was a large land mass and good industrial activities.

Today Hong Kong has become the largest trading centre in the world, mainly on the part of re-exports, which again do not require much of her land size. It is a world's largest re-export centre for products manufactured in China mainland. Early empirical criticism towards this theory was given by Wassily Leontief in 1954, with his input – output studies of American economy. While it was traditionally supposed that America had capital abundant relative to labour, and so according to Heckscher and Ohlin (H-O) theory he expected to find that America would have capital intensity, on the contrary, his findings revealed that more successful American exporting industries had higher labour intensity compared to the importing competing commodities (Alaba, 2003). This came to be known as the Leontief paradox which stood as a major criticism to this theory; however it was later challenged as being a mere misunderstanding of the H-O theory (Goldberg, 2009). Moreover, the assumption that factors

of production are identical between countries renders the theory weak. Labour factor for example, in reality labour skills are very different within and between economies for the reason that different people have different quantities and types of training and education (Daniels and Radebaugh, 1995). Besides, factors are not immobile anymore. With the free trade era, the mobility of factors of production is an indispensable element in international trade. Likewise, assuming identical production technologies among countries is not supported by the real life today; which makes this model (just as it is the case with the previous model) fail to successfully explain the recent patterns of the global trade.

5.4 Complementarity and Substitutability of FDI-Trade Nexus

The substitution effect between FDI and international trade was first supported by Nobel Prize winner Mundell (1957), who used a general H-O model to show that an increase in trade barriers will stimulate capital movement, implying a substitutional relationship. The general idea behind this argument is that trade between countries is observed when there is a difference in factor endowments and factor prices. If these factor endowments become mobile, differences in factor endowments will decrease and as a result, trade flows between countries will also drop. Such a substitutive relation implies that an increase in FDI would cause a decrease in trade, an idea that has been adopted by many economists the following years and proven econometrically. Over the last few decades, many studies have been conducted about the relationship between FDI and trade but there is no united conclusion about the nature of this relation. A large portion of the existing literature demonstrates a significant negative correlation, implying FDI and trade to be substituted while others come up with the opposite results. Substitution theory argued that FDI is an alternative method to exports of penetrating foreign markets. Firms have two options that would allow them to enter a foreign market: export their goods or invest in a foreign affiliate and produce the goods abroad. In this sense, FDI seems to substitute trade.

The theory of complementarity is based upon two main arguments. The first argument is that the investing firm in the destination country may require additional inputs from the source country and thus an increase in FDI flows will cause more exports due to intra-firm trade (Blonigen, 1997). The second is that the production of a specific product in a foreign market may lead to an increased demand for similar products that are not produced in the destination country. In this case, customer loyalty generates more exports. The first attempt to define this relationship empirically was made by Lipsey and Weiss (1981) who applied the gravity model on a dataset of 44 destination countries with 14 different industries for US outward FDI and exports. They found that production in a foreign affiliate increased the total demand of goods. These goods are either intermediate products required for product assembly in the host country or final products. The presence of a firm in a foreign country producing one specific good can lead to increased sales for all the products in its product portfolio through more efficient distribution, brand advertisement and sales services. Consequently, this leads to more exports with no significant difference between developed and developing countries. However, the econometric method that is used is rather outdated for our standards, since it uses a simple OLS regression of trade on multination activity. Brainard (1997) goes one step further by using random and fixed country effects as well as a generalized TOBIT model with the results not changing significantly compared to Lipsey's and Weiss' findings.

Graham (1999) and Pantulu and Poon (2003) both examine US and Japan FDI and find that FDI has a positive and significant effect on exports, even though their datasets are limited to only 3 years, which could cast doubt over the validity of their findings. When using a wider dataset with over 10 years each, Wilamoski and Tinkler (1999) and Kimura and Kiyota (2006) confirmed the positive effect of FDI on trade for US and Japan. Similar results are found by Martinez et al. (2012) and Filippaios and Kottaridi (2014) for the European Union countries and central and eastern European countries respectively. Other studies that argue for the

complementarity of outward FDI and exports include Markusen (1983), Yu and Zhao (2008) and Alguacil and Orts (1999). There is also a number of papers that present mixed results, highlighting the complexity of this relationship. These paper focusses - like most of the following studies - more on the US and Japanese economies because of data availability. Swenson (2004), for example, investigated US FDI and exports, and his results suggested that the nature of their relationship depended on the different industry level of exports that were being examined. More specifically, he found that FDI and trade are substituted at the product level and complemented at the manufacturing level. Very similar results were found by Wang (2007) and Bedassa (2003) when examining China and Japan respectively.

As shown in the work of Bergstrand (1985), gravity equation is regarded as the direct implication of the trade model that is built on the monopolistic competition model by Krugman (1980). Under the monopolistic competition model, countries with similar size trade differentiated goods because consumers have preference for variety. Thus goods are not differentiated by country of origin or location of production, but rather firm's location is endogenously determined and economies are specialized in the manufacturing of different sets of goods. Helpman (1987) uses the gravity model to show that the monopolistic competition model predicts greater trade for economies that are more similar in economic size and suggests that within the OECD the growth of trade is greatly explained by the convergence in size of the member economies. However despite the fact that the non-OECD engage in very little of the intra-industry trade as compared to the OECD, yet Hummels and Levinsohn (1995) showed that specialization in these (non-OECD) countries performs the same function as the role played by differentiated goods in boosting intra-industry trade among the OECD countries. Under the imperfect substitute model, where each firm produces a product that is an imperfect substitute for another product and has monopoly power in its own product, consumers show preference for variety (Krugman and Helpman, 1985). When the size of the domestic economy

doubles in terms of market due to trade, consumers increase their utility for they will have more varieties. As shown earlier in this chapter, trade can provide the same effect by increasing consumers' opportunity for even greater variety.

Consequently, when two countries have similar technologies and preferences, obviously they will trade more with each other in order to increase the number of varieties available for consumption.

Zhang (2005) has tried to place proper emphasis on the role of FDI in the export promotion by studying China's economy. He stated in his findings that China's export boom was accompanied by substantial inflows of FDI and China moved from the 32nd in 1978 to the 3rd largest exporting country in the world in 2004. Prasarma (2009) confirmed in his work that in a globalizing world, export success can serve as a measure for the competitiveness of a country's industries and lead to faster growth. Recently, a more optimistic view on the role of FDI on export performance in the host country has evolved. Sharma and Kishor (2000) by analyzing the data from 1970 to 1998 had a view that the export growth in India has been much faster than GOP growth over the past few decades. Several factors appear to have contributed to this phenomenon including FDI. However, despite increasing inflows of FDI especially in recent years there has not been any attempt to assess its contribution to India's export performance one of the channels through which FDI influences growth.

Horizontal FDI

Horizontal FDI is centred on conquest strategies of local markets, essentially in developed countries. High transport costs incurred by horizontal FDI make them more costly trade. The MNCs of horizontal type are created if the benefits of consumer nearby location are greater than those related to the concentration of activities. Therefore, the firm implements several production sites to serve local markets provided it achieves economies of scale. The costs of implementing these different sites should reduce transport costs and increase market demand. The strategies of multinationals are able to serve the foreign market through the establishment of a new subsidiary instead of resorting to export based on many factors, like trade costs and size market determining the creation of a horizontal MNC. Markusen (1984) is one of the pioneers in explaining that the horizontal FDI model is generated by the engine of the economies of scale at a firm's level. He argued that a company with two subsidiaries has a fixed cost twice less than the fixed cost of a company with one subsidiary, which encourages the multiplication of subsidiaries. Markusen (1995) described the horizontal multinational as an alternative option to trade and local firms provided that the amount of direct investment abroad increases with a greater proportion than trade, as rates and transportation costs increase. However, Brainard (1993) suggests that horizontal FDI appears as an alternative to export if trade costs are higher than the fixed costs of setting up a new subsidiary, known as proximity-concentration approach. MNCs horizontal type split their activities between countries according to different comparative advantages. The model of Markusen and Venables (1996) distinguishes multinationals according to this typology and complete results of Brainard (1993) model.

Vertical FDI

The production in a foreign country may be accompanied by exports of intermediate goods from the country of origin to the host country in order to be used as resources for local

production of final goods. However, the increase in trade costs may encourage producers to fragment the production process, by implementing the intensive stage production work in low-wage countries, and the more capital-intensive (R&D assembly, headquarters units, etc.) stage production in industrialized countries. The various operations of subsidiaries of MNCs specialize from localization advantages in the host country as a strategy for international division of the production process (Mulder and Rabaud, 1996). Low transport costs encourage vertical FDI since they make available the use of a cheap labour force. Each subsidiary specializes in a segment of the value chain and the production is only for export and not for the host market. The vertical MNCs type seeks to gain price competitiveness for all sectors, with regard to the traditional labour-intensive sectors like textiles and clothing, or technology-intensive sectors. Yeaple (2003), Hansen et al. (2003), Feinberg and Keane (2003) showed that vertical FDIs are significant in the sectors of mechanical and electronic industries.

However, the distinction between horizontal and vertical FDI is not so clear in practice; MNCs often engage in complex integration strategies that encompass both forms of integration, vertical in some countries and horizontal in others (Yeaple, 2003). The complex integration strategies are preferred to single expansion strategies either horizontal or vertical when transport costs fall below a certain threshold. Furthermore, there is a marked difference between the two patterns which distinguishes the relationship between trade and FDI for two reasons, discussing what type of FDI for what kind of relationship and for what sector. In examining the FDI-trade relationship, the unresolved question that is addressed in this thesis is whether FDI and trade are complementary or substitute, that is, whether FDI is trade creating or trade replacing/substituting in Nigeria. FDI is said to be trade creating for a country when its investments made in a host economy lead to higher levels of both exports from, and imports to the home country.

5.5 Theoretical Background and Hypothesis Development

Empirical literature on FDI-export performance nexus has shown that not in every location nor in every industry does FDI contribute to export performance (Greenway et al., 2004; Kneller and Pisu, 2007). However, the consensus is that the effects of inward FDI on export growth of the host country may take place both directly and indirectly. The direct effects arise when MNEs, established production affiliates in the host country as export platform to make exports to the home country or third countries. Export oriented FDI seeks to exploit the comparative advantages of the host country due to differences in factor intensities between the host and home countries. Another possible channel through which FDI indirectly affect exports is through spillover effects. The transmission mechanism through which spillover effects might boost the productivity of domestic firms are through the adoption of technology and operation followed by the foreign producer, knowledge transfer by the movement of skilled employees from MNEs to domestic firms, increase in the efficiency of domestic firm's due to competition faced from MNEs and learning export from the export behaviour of MNEs (Gorg and Greenaway 2004). Some studies found existence of positive spillover effects of FDI on the labour productivity of domestic firms and on the rate (Blomstrom and Persson, 1983; Blomstrom, 1986; Wolf, 1994). De Gregorio (2003) argued that FDI may allow for technology and knowledge transfer to a host country which may increase productivity growth in the economy. For example, Greenway et al. (2004) and Kneller and Pisu (2007) opined that MNC, especially those who are export oriented, appear to instigate positive export spillover and may increase the probability of exporting for local firms operating in the same industry. Kokko et al. (2001) examined the decision to export by domestic firms in Uruguay using a cross sectional firm level data for 1998. They found that domestic firms are more likely to export if they operate in sectors where foreign firms presence are relatively high. Greenaway et al. (2004), using data on a large panel of firms in the U.K. to identify the possible transmission mechanism for export spillovers and its effects on the export decision of domestic firms, found positive

spillover effects on U.K.-owned firms as well as on their export propensity. Kneller and Pisu (2007) also found similar results using the two steps Heckman selection model. The results indicate that the decision to export is positively associated with the presence of foreign firms in the same industry and region and export oriented foreign affiliates generate stronger export spillovers. However, Goldberg and Klein (1998, 1999) failed to find any empirical evidence between FDI and export performance in Latin America. According to them, the trade-promoting effects of FDI appear to be weak or insignificant with regards to Latin American trade with USA and Japan. Also, Barriers et al. (2003) found little evidence of export spillover to local firms from the existence of MNEs in Spain. The same result of no export spillover was also found for Ireland by Ruane and Sutherlands (2004). Sharma (2000), using annual data from 1970 to 1998, in a simultaneous equation model, did not observe a statistically significant relationship between inflows of FDI and exports of India. Kuntluru et al. (2012) observed a negative relationship between FDI inflow and Pharmaceutical Exports from India. Bhaduri and Ray (2004) examined firm specific determinants of firm level exports performance in India and concluded that foreign firms are more successful in exporting than domestic firms. Here, FDI promotes export by investing capital in the exploitation of low-cost labour and manufacturing activities.

In the case of Nigeria, studies on FDI-export nexus have also found similar mixed results. Olayiwola and Okodua, (2013) examines the contribution of Foreign Direct Investment (FDI) to the performance of non-oil exports in Nigeria. The results revealed that a unidirectional causality runs from FDI to non-oil exports. Aigheyisi (2015) investigates the effects of import penetration and FDI inflows on the performance of Nigeria's non-oil exports in the period from 1981 to 2012. The study revealed that the short run and long run impacts of FDI on non-oil export performance were not statistically significant. Babatunde (2017) examined the relationship between inward FDI and export performance in Nigeria agricultural sector.

Empirical analysis revealed a positive and significant impact on total export and exports in manufacturing, oil and services sectors. However, FDI does not have any significant relationship with agricultural exports.

Empirical studies have also shown that when FDI is targeted in the dominant industry of the host country for domestic inputs it promotes exports. For example, Kugler (2006) investigates the effect of foreign investment on the exports of Venezuelan manufacturing firms using panel data analysis covering the period from 1995 to 2001. The study found that the extent to which FDI stimulates export is dependent on multinational corporation's demand for domestic input. Heliso (2014) investigates the impact of inward FDI on disaggregated export of member countries of COMESA in the period from 1993 to 2012. The empirical result showed a positive, significant relationship between FDI and export in agriculture, manufacturing and natural resource, the impact being larger on manufacturing exports. Studies in China indicate that increased levels of FDI positively affect Chinese manufacturing export performance (Sun 2001; Zhang and Song 2001; Zhang 2005). These authors attributed the results to the fact that FDI in China has largely been export-oriented due to manufacturing industry. Athukorala and Menon (1995) studied the role of export-oriented FDI in Malaysia's manufactured exports. The export-oriented FDI has brought a significant return to Malaysia because of favourable economic climate for internationalization of production. In the case of oil and gas sector, Gawad and Muramalla (2013) conducting a simple regression model for seventeen countries, revealed that there is a positive and significant relationship between FDI and exports of oil and gas industries. In the case of Nigeria, Babatunde (2017) recorded a significant result for FDI impact on export in oil and services. This study, therefore, hypothesised that:

H9:

Inward oil and gas FDI has a positive impact on export performance in Nigeria.

H9a:

OECD countries' oil and gas FDI has a positive impact on export performance in Nigeria.

H9b:

Non-OECD countries' oil and gas FDI has a positive impact on export performance in Nigeria.

Other Factors That Could Also Influence Export Performance

FDI-export performance may also depend on other relevant factors in the host country. For example, Adhikary (2012) study shows that FDI impacts on exports is further explained by trade openness, domestic demand, and exchange rate. Babatunde (2017) also revealed that real exchange rates, terms of trade, infrastructure, labour and technology are other factors that influence export performance in Nigeria. The theoretical underpinning of this perspective is centred on the preposition that resources and market access brought with FDI will complement the host's resources and capabilities and provide some of the missing elements for greater competitiveness. For example, location with cheap labour force or with highly skilled labour force will promote domestic production which in turn attracts export oriented MNEs. The transfer of new assets by foreign affiliates through training, skills development and knowledge diffusion opens up prospects for further dissemination to other enterprises and the economy at large which in turn promotes export. Labour factor has a direct effect on production efficiency and costs. In the FDI literature, studies have shown that high labour costs discouraged FDI inflows (Noorbakhsh et al., 2001), while high labour productivity encourage FDI inflows (Al-Sadig, 2009). Education remains an important aspect in human capital development. An increase in the supply of educated people as well as the quality of their education can improve locational advantages (Noorbakhsh et al., 2001). Education results in a labour force that is literate, numerate and skilled in the use of modern production facilities and techniques (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007). According to Lucas (1990) lack of human capital

discouraged foreign investment in less-developed countries. Zhang and Markusen (1999) put forward a model where the availability of skilled labour in the host country is a direct requirement of MNEs and affects the volume of FDI commitment.

H10: Human capital development has a positive effect on the impact FDI on export in Nigeria.

The more open an economy is to international trade and investments, the more FDI it attracts (Mina, 2007). IB scholars argued that the degree of trade openness is likely to influence the flows of international capital. The idea here is that foreign investors are not interested in committing long-term investment in a country that imposes tariff and non-tariff barriers on investment and creates problems in repatriating capital as well as profits (Adhikary, 2011). The level of trade openness also indicates the degree of comparative advantage of a country in undertaking investment and produce for export. This relates to 'transaction cost theory' which postulates that a low transaction cost environment generates financial incentives (higher return on investment) for both the domestic and foreign players in supplying large irreversible investment like FDI (Coase 1937, Williamson 1975). Edwards (1992) also noted that countries with a higher degree of economic openness can grow faster by absorbing new technologies at a faster rate than a country with a lower degree of openness. The literature (Marelli and Signorelli, 2011; Yanikkaya, 2003; Edwards, 1993) defines trade openness as a ratio of total trade (imports + exports) to a country's national income (GDP). Yanikkaya (2003) holds that much attention on the degree to which countries are open to international trade is driven by the fact that a lot of empirical studies have as their conclusion that openness to international trade yields higher growth rates. This resulted from the terrible failures of the import substitution policies that were adopted by most developing countries in the 1970's as a strategy towards economic development.

Through opening up their economies, countries enhance their economic growth through the integration of markets and technologies which improves their productivity and exports.

Internationalisation makes countries opt for policies to reduce tariffs on trade of agricultural products, which in turn increases the demand, production, and trade of those products (Cabrera Schneider, 2009). With an open economy, the vulnerability brought by negative imports is balanced by a significant benefit of productivity and competitiveness, drawn from international trade. Besides, higher levels of openness tend to stimulate more foreign investment, hence opening more sources of employment for the local workforce; it also bring along new technologies which positively affect productivity levels. The literature presents economic openness as either commercial openness or financial openness. Besides they are also termed as trade openness and capital account openness (Yanikkaya, 2003; Fereidouni et al., 2011; Eichengreen and Leblang, 2008). The two are sometimes intertwined and most often one induces the other; a country being open to trade could induce a greater financial openness level of a country by attracting in (through investment) capital flows in the financial sector of that particular country. Aizenman and Noy (2003) found that an increase by one standard deviation of commercial openness is associated with a 9.5 per cent increase in de-facto financial openness (as a percentage of GDP). Financial openness to the international economy is often measured by the sum of gross private capital inflows and outflows (Aizenman and Noy, 2003).

Economic theory indicates that the more a country has a freedom of international exchange the more it can benefit from openness in terms of producing larger output and achieving higher income. This is in line with Ricardian theory which asserts that international trade brings about more efficient use of a country's resources by importing goods and services that otherwise are expensive to produce within the country, hence enhancing the general economic growth of a country (Georgios, 2002; Yanikkaya, 2003; Gwartney, 2001; Niroomand and Nissan, 1997). It is also asserted that in most cases greater economic openness promotes entrepreneurial and innovativeness activities based on the fact that there will be a strong desire for efficient production and competitiveness in the international market. Gwartney (2001) points out that

openness may induce countries to have sound institutions and policies in place so they can be competitive in creating conducive environments for trade and investment activities. Obviously, in the globalised world, no investor would be in favour of investing in a country characterized by hostility towards business investors, monetary instability, legal uncertainty, high taxes, and low quality public services (Gwartney, 2001). A direct opposite of trade openness is trade barrier. According to Blonigen (2005) a trade barrier may force foreign affiliates to substitute imports to direct production (this is known in the FDI literature as tariff jumping FDI).

H11: Trade has a positive effect on the impact OGFDI on export in Nigeria.

Infrastructure relates to physical and non-physical systems provided by public institutions to facilitate business operation and society. The quality of host location infrastructure could influence FDI inflows (Asiedu, 2006). Ang (2008) argued that the provision of infrastructural support could raise the productivity of capital, and expand the overall resource availability by increasing output. Asiedu (2006) found that countries with good infrastructure attract FDI in SSA.

Udoh and Egwaikhide (2008) in their study of FDI in Nigeria between 1970 and 2005 found that infrastructural developments (appropriation size of government spending) are a crucial determinant of FDI inflows into the Nigerian economy. Limao and Venables (2001) establish that variations in infrastructure lead to 40 per cent variation in transport costs. Their gravity model estimations reveal that a country improving its infrastructure from a median of 75th percentile is likely to increase its trade levels by 60 per cent. The efficiency of the ports has an effect on the freight costs as asserted by Clarck et al. (2004): a deterioration of port efficiency and seaport infrastructure in general from 25th to 75th percentile is associated with a rise in freight costs by 12 per cent. Longo and Sekkat (2004) examined the intra-African trade by using the gravity model to test the impact of infrastructure availability, economic policy and internal political tensions in African countries. They also proved that intra-African trade is

negatively affected by poor infrastructure, economic policy mismanagement, and internal political tensions.

H12: The quality of Infrastructure has a positive effect on the impact OGFDI on export in Nigeria.

Political instability or frequent occurrences of political disorder can result in an unfavourable business climate which seriously erodes risk-averse foreign investors' confidence in the local investment climate and thereby repels FDI (Schneider and Frey 1985; Wahid et al., 2009). Asiedu (2002) in a study on determinants of FDI flows to SSA, concluded that FDI in Africa is not solely determined by availability of natural resources but also that institutional factors play an important role in directing FDI through macroeconomic and political stability, and efficient institutions. Asiedu (2006) found that an efficient legal system, less corruption and political stability promote inward FDI to SSA countries. In another related study, Cleeve (2004) examined the effectiveness of fiscal incentive to attracting FDI to SSA countries using a multiple regression analysis. In the case of Nigeria, Salisu (2003) analysed the impact of corruption on FDI in Nigeria and found that corruption have a significant detrimental effect on FDI. Longo and Sekkat (2004) asserted that except for political tensions, the identified obstacles are specific to intra-African trade, as they do not find them having an impact on African trade with developed countries. Together with these finding in some other studies (Musila and Sigué, 2010; Akbarian and Shirazi, 2012), the gravity model has been used to examine the extent of the effect corruption has on African bilateral trade flows and Middle east and Latin American trade flows. Both studies prove that corruption adversely effects the flow of exports and imports among countries. A higher degree of openness compels countries to pursue good quality microeconomic policies so as to create favourable environments for inhibiting capital flights and being in line with the international and inter regional agreements. Since good policies create a stable microeconomic environment, these countries are expected

to positively affect their economic growth for they not only eliminate price uncertainty in their economies but also moderate public deficit and debt levels. Eventually this enhances the capacity of the domestic firms to compete internationally (Rose, 2002).

H13: Political stability has positive effects on the impact OGFDI on export in Nigeria.

Another macroeconomic factor that might affect FDI-export performance is the exchange rate. The effect of the exchange rate relates to the volatility of the currency of the host location against foreign currencies (Blonigen, 2005). Froot and Stein (1991) put forward an imperfect capital markets explanation for why home country currency appreciation may actually increase foreign investment activity by domestic firm. Imperfect capital markets mean that the internal cost of capital is lower than borrowing from external sources, such that an appreciation of the currency leads to increased firm wealth and provides the firm with greater low-cost funds to invest relative to the counterpart firms in the foreign country that experience the devaluation of their currency. Klein and Rosengren (1994) revealed that US MNEs FDI in developing or emerging markets is explained by exchange rate depreciation in the host location. Blonigen (1997) provided an alternative explanation for the effect of the exchange rate on inward FDI for a host location.

Blonigen (1997) argued that depreciation of host location currency will lower the price of the asset and thus attract MNEs for strategic asset seeking FDI. Empirical studies on the changes between the host/home countries' currencies have produced mixed findings. For example, Swenson (1994), and Kogut and Chang (1996), examined whether short-run movements in exchange rates led to increased inward FDI; they all reported increases in inward FDI. Lipsey (2001) studied US FDI in three regions as they experienced currency crises (Latin America in 1982, Mexico in 1994, and East Asia in 1997) and found that FDI flows are much more stable during these crises than other flows of capital. Desai et al. (2004) compared the performance of US foreign affiliates with local firms when faced with a currency crisis and documented that

US foreign affiliates increase their investment, sales and assets significantly more than local firms during and subsequent to the crisis. They attributed the differences to MNEs abilities to finance investment internally to a larger extent than local firms. The results are consistent with the proposition that a diminished currency value is associated with greater FDI inflows. This is because a depreciated currency value would lead to higher relative wealth position of foreign investors and hence lower the relative cost of capital. This allows foreign investors to make a significantly larger investment in terms of the domestic currency.

H14: Exchange rates has positive effects on the impact OGFDI on export in Nigeria.

Also, FDI-export may react negatively to an increase in corporate tax rate. This is in line with the argument that lowering corporate tax rate is an effective policy instrument to boost inward FDI (Ang, 2008). For example, DeMooij et al. (2003), after conducting a meta-analysis of 25 empirical studies, revealed that 1%-point reduction in the host-country tax rate raises FDI in that country by 3.3%. Blonigen (2005) noted that the effects of taxes on FDI can vary substantially from type of taxes, measurement of FDI activity, and tax treatment in the host and parent countries. Earlier literature on taxation effects of FDI point to Hartman's papers (1984); these studies point out a way in which certain types of FDI may surprisingly not be very sensitive to taxes. The key insight from Hartman's work is that earnings by an affiliate in a foreign country will ultimately be subject to parent and host country taxes regardless of whether it is repatriated or reinvested in the foreign affiliate location to generate further earnings. Previous studies examining the effect of state taxes on state location of FDI found insignificant results (Coughlin et al., 1991).

5.6 Chapter Summary

This chapter provided extensive literature on the impact of oil and gas FDI on export performance. It was observed in the literature that trade and oil and gas FDI nexus following a

dynamic relationship. From the onset, FDI and international trade are viewed to have a substitution effect. Recent studies have shown that not only does FDI complement trade but it encourages firms competitiveness in host country across different locations and thus motivate international trade. The effects of inward FDI on export growth of the host country occurs when MNEs establish production affiliates in the host country as platform to make exports to the home country or third countries. This export-oriented FDI seeks to exploit the comparative advantages of the host country due to differences in factor intensities between the host and home countries. The next chapter is the methodology used in this study.

6.0 Chapter Six: Methodology

6.1 Introduction

The main purpose of the study is to investigate the determinants and impact of oil and gas FDI in Nigeria. This chapter, hence, provides a critical review of literature relating to alternative research methods and methodology adopted for business research. This chapter identifies the different research philosophies, methodology and methods employed by this study. This chapter is organised into seven sections.

O’Leary (2004) describes methodology as the framework which is associated with a particular set of paradigmatic assumptions that are used to conduct research. Brown (2006) noted that methodology is the philosophical framework within which the research is conducted or the foundation upon which the research is based. Research methodology describes the research methods, approaches and designs used throughout a research work, justifying the advantages and disadvantages of each approach and design. Allan and Randy (2005) noted that research methodology should meet two main criteria: firstly, the methodology should be the most appropriate to achieve the research objectives; and secondly, it should be replicable in other researches of the same nature.

6.2 Research Philosophy

Research philosophy deals with the nature, source and development of knowledge through research (Bajpai, 2011). In research, philosophy reflects the author’s important assumptions and these assumptions serve as the base for the research strategy (Allen and Randy, 2005; Saunders and Thornhill, 2012). Generally, research philosophy has many branches related to a wide range of disciplines. Within the scope of business research, there are four main research

philosophies: Pragmatism; Positivism; Realism; and Interpretivism (Interpretivist) (Saunders and Thornhill, 2012).

The identification of the research philosophy as positioned at the outer layer of the ‘research onion’, helps researchers to provide more clarity in adopted research methodology (see Figure 8 below).

Insert Figure 8 here

The choice of a specific philosophy by a researcher is influenced by practical implications on the research phenomena and the researcher philosophical stance. There are two aspects of research philosophy: ontology and epistemology. Ontology is a system of belief that reflects an interpretation of an individual about what constitutes a fact. In simple terms, ontology is associated with a central question of whether social entities need to be perceived as objective or subjective. Accordingly, objectivism (or positivism) and subjectivism can be specified as two important aspects of ontology (Cohan et al., 2077; Blaikie, 2010; Bryman, 2012; Saunders and Thornhill, 2012).

On the other hand Epistemology, as a branch of philosophy, deals with the sources of knowledge. Specifically, epistemology is concerned with possibilities, nature, sources and limitations of knowledge in the field of study. Epistemology has many branches and includes essentialism, historical perspective, perennialism, progressivism, empiricism, idealism, rationalism, constructivism and others (Blaikie, 2010 and Bryman, 2012). Well defined ontology, epistemology and research methodology constitutes the research paradigm (see Figure 9 below).

Insert Figure 9 here

Pragmatism Research Philosophy

Pragmatism research philosophy recognises that there are different ways of interpreting the world and undertaking research (Cohen et al., 2007). As such, no single point of view can ever give the entire picture and there may be multiple realities (Saunders and Thornhill, 2012). According to pragmatism research philosophy, the research question is the most important determinant of the research philosophy. Pragmatics can combine both positivist and interpretivism positions within the scope of a single research based on the nature of the research questions. However, pragmatism research philosophy can integrate more than one research approach and research strategy within the same study. Pragmatist management researchers do not have to use multiple methods but rather they use a method or a combination of methods that advances a specific research in the best possible manner (Blaikie, 2010; Bryman, 2012; Saunders and Thornhill, 2012).

Positivism Research Philosophy

Positivism is based on the idea that science is the only way to learn about the truth. As a research philosophy, positivism adheres to the view that only “factual” knowledge gained through observation, including measurement, is trustworthy (Bryman, 2012; Saunders and Thornhill, 2012). In positivism research, the role of the researcher is limited to data collection and interpretation through an objective approach and the research findings are usually observable and quantifiable. Positivism depends on quantifiable observations that lead themselves to statistical analysis. It has an atomistic, ontological view of the world as comprising discrete, observable elements and events that interact in an observable, determined and regular manner (Collis and Hussey, 2014). In positivism research, the researcher is independent from the study, and there are no provisions for human interests in the research process (Wilson, 2010). According to Crowther and Lancaster (2008), as a general rule, positivist studies usually adopt a deductive approach, instead of the inductive research approach. Positivism relates to the point of view that researcher needs to concentrate on facts

(deductive), whereas inductive research has provision for human interest (Ramanathan, 2008). Positivism often involves the use of existing theory to develop hypotheses to be tested during the research process (O’Leary, 2004). Science can be specified as a cornerstone in positivism research philosophy.

Positivism as an epistemology is widely criticised as descriptive, as they lack insight into in-depth issues (Easterby-Smith and Jackson, 2008).

Realism Research Philosophy

As a branch of epistemology, realism research relies on the idea of independence of reality from the human mind. This philosophy is based on the assumption of a scientific approach to the development of knowledge. Realism can be divided into two groups: direct and critical.

Direct realism can be described as “what you see is what you get” (Novikov and Novikov, 2013). In other words, direct realism portrays the world through personal human senses.

Critical realism, on the other hand, argued that humans do experience the sensations and images of the real world. Thus, critical realism proposed that sensations and images of the real world can be deceptive and usually do not portray the real world (Novikov and Novikov, 2013).

Critical realists recognised that our senses and other factors may get in the way between us as researchers and the researched reality. There is a consensus among researchers that critical realist is more popular and appropriate than direct realist approach due to its ability to capture the fuller picture when studying a phenomenon (Easterby-Smith and Jackson, 2008; Novikov and Novikov, 2013).

Interpretivism (interpretivist) Research Philosophy

Interpretive researchers assume that access to reality (actual or socially constructed) is only through social constructions such as language, consciousness, shared meanings, and instruments (Myers, 2008; Littlejohn and Foss, 2009). Development of interpretivist

philosophy is based on the critique of positivism in social sciences. Interpretivism philosophy is associated with the philosophical position of idealism, and is used to group together diverse approaches, including social constructivism, phenomenology and hermeneutics; approaches that reject the objectivist view (Collins, 2010; Saunder and Thornhill, 2012). Interpretivist approach proposed that it is important for the researcher as a social actor to appreciate differences between people (Saunder and Thornhill, 2012).

The interpretivist approach is based on naturalistic approach of data collection such as interviews and observations. The main disadvantages associated with interpretivism relate to the subjective nature of the approach and create room for bias in the research process. On a positive note, adoption of interpretivism for qualitative research such as cross-cultural differences in organisations, issues of ethics, leadership and analysis of factors impacting leadership etc. can be studied in great level of depth with the interpretivist approach rather than positivist approach (Collins, 2010; Saunder and Thornhill, 2012).

6.3 Research Approach

Research approach can be divided into three types: deductive research; inductive research and abductive research. A deductive approach is concerned with developing hypotheses based on existing theory and, designing a research strategy to test the hypothesis (Gulati, 2009 and Babbie, 2010). In other words, deductive means reasoning from the particular perspective to a general perspective. The deductive approach can be explained by the means of hypotheses, which can be derived from the propositions of existing theory and deducting conclusions from the propositions (Pelissier, 2008; Snieder and Larner, 2009). Deduction begins with an expected pattern that is tested against observations, whereas induction begins with observations and seeks to find a pattern within them. Deductive research approach explores a known theory or phenomenon and tests if that theory is valid in a given circumstance. It has been noted that the deductive approach follows the path of logic most closely. The reasoning starts with a

theory and leads to a new hypothesis. This hypothesis is put to the test by confronting it with observations that either lead to a confirmation or a rejection of the hypothesis (Snieder and Larner, 2009) (see Figure 10 below).

Insert Figure 10 here

On the other hand, the inductive approach, also known in inductive reasoning, starts with the observations and theories are proposed towards the end of the research process as a result of observations (Goddard and Melville, 2004). Inductive research involves the search for patterns from observations and the development of explanations of theories for those patterns through series of research questions (Bernard, 2011). No theories or hypotheses would apply in inductive studies at the beginning of the research and the researcher is free in terms of altering the direction for the research after the research process had commenced. It is important to stress that an inductive approach does not imply disregarding theories when formulating research questions and objectives (Collins, 2010; Saunders and Thornhill, 2012). The approach aims to generate meaning from the data sets collected in order to identify patterns and relationships to build a theory; however, the inductive approach does not prevent the researcher from using existing theory to formulate the research question to be explored (Saunders and Thornhill, 2012). Inductive reasoning is based on learning from experience such that, patterns, resemblances and regularities in experience (premises) are observed in order to reach conclusions (or to generate theory). In Business Research, inductive reasoning is often referred to as a “bottom-up” approach, in which the researcher uses observations to build an abstraction or to describe a picture of the phenomenon that is being studied (see Figure 11 below). It is important to note that the application of an inductive approach is associated with qualitative methods of data collection and data analysis, whereas a deductive approach is perceived to be related to quantitative methods.

Insert Figure 11 here

The last research approach known as the abductive approach is set to address weaknesses associated with deductive and inductive approaches. Specifically, deductive reasoning is criticised for the lack of clarity in terms of how to select theory to be tested via formulating hypotheses. Inductive reasoning, on other hand, is criticised because no amount of qualitative data will necessarily enable theory-building (Saunders and Thornhill, 2012). Abductive reasoning, as a third alternative, overcomes these weaknesses via adopting a pragmatist perspective. In abductive approach, the research process starts with ‘surprising facts’ or ‘puzzles’. ‘Surprising facts’ or ‘puzzles’ may emerge when researcher’s encounters with an empirical phenomenon that cannot be explained by the existing range of theories. When following an abductive approach, the researcher seeks to choose the ‘best’ explanation among many alternatives identified to start the research process (Bryman and Bell, 2015).

6.4 Research Methods

Research methods may be understood as all those methods and techniques that are used for conducting research (Saunders and Thornhill, 2012). Research methods also refer to the instruments used in selecting and constructing research techniques (Brown, 2006). Research techniques refers to the instruments used in performing research operations such as making observations, recording data, techniques of processing data (Saunders and Thornhill, 2012). Research methods can be viewed as being broadly composed of two different types, i.e. qualitative research methods and quantitative research methods.

Qualitative methodology shows strength in “its ability to examine the dynamic, context-dependent and interactive phenomena”, which quantitative data is often not easily able to reveal, and therefore is useful for “the study of motivations and other connections between factors” (Hakim, 1978, p.28; Welch *et al.*, 2002, p.612; Eisenhardt and Graebner, 2007).

Quantitative research primarily focuses on numerical evaluation. It is applicable to phenomena that can be expressed in terms of quantity or the generation of data in quantitative form which can be subjected to rigorous quantitative analysis in a formal and rigid fashion (Saunders and Thornhill, 2012). Quantitative research methods can be further sub-classified into inferential, experimental and simulation approaches to research (Saunders and Thornhill, 2012). In contrast, qualitative research involves the investigation of human experience and analysing words rather than numbers. A qualitative approach to research is concerned with subjective assessment of attitudes, opinions and behaviour (Collins, 2010; Saunders and Thornhill, 2012). Qualitative research is a function of the insights and impressions. A qualitative approach to research generates results either in non-quantitative form or in the form which are not subjected to rigorous quantitative analysis (Collins, 2010; Saunders and Thornhill, 2012). For example, the techniques used in focus group interviews, projective techniques and depth interviews. This type of research aims at discovering the underlying motives and desire (Easterby-Smith and Jackson, 2008; Novikov and Novikov, 2013). Research designed to find out how people feel or what they think about a particular subject or institution is also qualitative research. Qualitative research is especially important in the behavioural sciences where the aim is to discover the underlying motives of human behaviour.

6.5.0 The Chosen Research Approach, Methodology and Methods

This study draws its research methodological and philosophical assumptions from the positivist, quantitative and deductive research approach (Soiferman, 2010; Creswell and Creswell, 2017). In business research, research design depends on the research context, research question(s) and prior studies within the research discipline (Tuli, 2010; Saunders *et al.*, 2019). IB is a multi-cultural and multi-dimensional field of study that lends itself to a broad range of research designs, methodologies, and methods (Popkewitz, 2012). In IB research, quantitative and positivistic empirical methods are well established, particularly, within the

area of macroeconomic determinants (Hill and Munday, 1992; Fallon and Cook, 2010; Zhou, 2016). Leading journals in IB favour quantitative papers compared to qualitative papers (Birkinshaw, 2004; Hurmerinta-Peltomäki and Nummela, 2006). However, authors have reiterated that IB qualitative research is equally useful in exploring the complex plurality of institutional, cultural, and organisational factors (usually at the micro-level) (Hurmerinta-Peltomäki and Nummela, 2006). However, combining qualitative and quantitative methods in IB research has been criticised mainly for the lack of consistency in the implementation of triangulation approach between studies (Creswell and Clark, 2017). Creswell and Creswell (2017) argued that the impact of any research work depends on the appropriateness and rigour of the methods used.

6.5.1 The Study Sample

Insert Table 8 here

The main purpose of the study is to investigate the determinants and impact of oil and gas FDI in Nigeria. The study dataset covers a period of 17 years from 2001 to 2017 making a total observation of 306. As exhibited in Table 8, the dataset would be analysed in three separate groups that is country-level as a whole, OECD group and non-OECD group. The OECD countries group is made up of 204 observations and non-OECD countries group is made up of 102 observations. The OECD countries are a club of high income and technologically advanced countries that collaborate on key global issues at national, regional and local levels. In IB research, scholarly debate on heterogeneity of investing MNEs have suggested that MNEs from developed economies (DEs) often venture abroad to leverage their existing firm-specific assets (FSAs), on like EM MNEs. As argued by Blonigen and Wang (2005), it is important to distinguish between developed and developing countries as pooling of the two is inappropriate for empirical FDI studies. Dunning and Narula (1996) further pointed out that the IDP pattern

may be idiosyncratic and vary across individual countries owing to their differences in economic structures, natural resource endowment, and government policies in particular. Porter's (1990) national competitive theory distinguishes four basic stages of national competitive development: 1) the factor-driven stage; 2) the investment-driven stage; 3) the innovation-driven stage; and 4) the wealth-driven stage.

The first three stages are associated with and characterised by specific types of factor endowment (Wysokinska 1998). Based on Porter's theory, Ozawa (1992) developed a dynamic framework by introducing an additional variable of FDI to emphasise the linkage between FDI and dynamic economic development process. He argued that FDI affects and reflects the stages of an economy (Ozawa 1992) and FDI pattern changes in line with the stages of structural transformations in the economy (Wysokinska 1998). The first factor-driven stage attracts resource seeking or labour efficiency-seeking inward FDI; the second investment-driven stage attracts market-seeking FDI in capital and intermediate goods industries; and the third innovation-driven stage attracts technology asset-seeking FDI in technology-intensive industries (Ozawa 1992). Porter (1990) and Ozawa (1992) concluded that most developing countries are in the first factor-driven stage and some are already on their way to the second investment-driven stage and should be in transition from attracting resource-seeking and efficiency-seeking FDI to market-seeking FDI. However, unlike Ozawa's dynamic pattern, Dunning (1999) claimed that motivations have shifted more recently from market-seeking and resource seeking to efficiency-seeking. Nachum and Zaheer (2005) suggested that a FDI host country possessing specific factors should be suitable for achieving certain motivations. "The desirability of FDI activities is related to the level of a country's factor endowments and development" (Enderwick 2005, p. 97).

6.5.2 Data Analytical Techniques

The study aims to examine the determinants of FDI inflows in Nigeria's oil and gas industry. In order to empirically proffer answers to the research questions, this study is underpinned by a positivist research philosophy. This is centred on the fact that positivist research is based on objective approach and the research findings are usually observable and quantifiable (Bryman, 2012). Positivism depends on quantifiable observations that lead to statistical analysis. Positivism relates to the point of view that the researcher needs to concentrate on facts (deductive), whereas inductive research has provision for human interest and subjectivism (Ramanathan, 2008). Crowther and Lancaster (2008) noted that, as a general rule, positivist studies usually adopt a deductive approach, instead of an inductive research approach. Hence, this study will follow a deductive research approach based on a quantitative research method. Quantitative research is applicable to phenomena that can be expressed in terms of quantity or the generation of data in quantitative form which can be subjected to rigorous quantitative analysis in a formal and rigid fashion. Hence, this study adopts a quantitative research method which corroborates with the deductive research approach and positivist research philosophy (Allan and Randy, 2005; Saunders and Thornhill, 2012).

In this study, empirical analysis will focus on data series using a panel data technique. Panel data capture variation in cross-section and overtime of observed units (Greene, 1997; Wooldridge, 2010; William, 2013). Panel data allows the use of much richer models and estimation methods. A panel dataset consist of n sets of observations on individuals denoted $i = 1, \dots, n$. If each individual (each observation unit) in the data set is observed the same number of times, usually denoted T , the data set is a balanced panel. An unbalanced panel data set is one in which individuals may be observed different numbers of times (i.e. different time series)

(Jefferey, 2002). For the purpose of this study, a balanced panel data is proposed where all the data set will be obtained for similar periods.

In the FDI literature, panel data estimation methods widely used are: pooled, fixed-effects and random-effects methods also known as the normal panel data techniques (Greene, 1997; Wooldridge, 2010; William, 2013). Certain considerations and assumptions will affect the choice between fixed effects and random effects model.

- When there exists an unobserved heterogeneity in the study model (due to omitted variables) present in the error terms, and these variables are correlated in the model, then fixed effects models may provide a means for controlling for omitted variable bias. In a fixed-effects model, the idea is that whatever effects the omitted variables have on the explanatory variable, they will also have the same effect at a later time; hence their effects will be constant, or fixed. To this end, performing first difference will eliminate such effects in the fixed effects methods.
- When the omitted variables are uncorrelated with the explanatory variables in the model, then a random effects model is probably best. It will produce unbiased estimates of the coefficients and produce the smallest standard errors.
- If there is no variability in the explanatory variables across time, a fixed effects model may not work very well or even at all. There needs to be within-subject variability in the data set. If there is little variability within subjects, then the standard errors from fixed effects models will be large and produce bias coefficients.
- Random effect (RE) can estimate time invariant variables. RE models can be estimated via Generalized Least Squares (GLS).

The choice between fixed effects and random effect estimators in panel data analysis can be done with the help of Hausman test (Hausman, 1981; Wooldridge, 2010). Hausman test compares the fixed and random effect models. The null hypothesis is that the (fixed or random) effect is not correlated with other regressors (independent variables). If the null hypothesis is

rejected, the fixed effect model will be used; otherwise, the random effect model will be used. Although, random effect model is viewed to be a better estimator than the fixed effect model.

If the null hypothesis is rejected, a random effect model will be suffering from the violation of the Gauss Markov theorem and end up with biased and inconsistent estimates. For the purpose of this study, a Hausman test will be done with a view to choose which between the dual estimators will be appropriate.

In this study, the normal panel data techniques could not be used because the study dependent variables were also used as independent variables (when lagged one year). Hence, dynamic panel data techniques are considered appropriate to address any issues of endogeneity problem caused by having the study dependent variables lagged also as independent variables in the empirical models. An alternative estimation technique such as the instrumental variables or Generalized-Method-of-Moment (GMM) techniques must be used. For the study, the GMM technique is adopted, in particular, the GMM used is that proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment). With the other explanatory variables excluded for clarity, a standard equation of panel data is stated below:

$$y_{it} = \beta y_{it-1} + (v_i + \epsilon_{it}) \dots \dots \dots (1)$$

As this is a panel model, each observation is indexed over i ($= 1 \dots N$) cross-section groups (here, investing MNE in the Nigeria as a whole and grouped into OECD and non-OECD) and t ($= 1 \dots T$) time periods (here, annual observations 2001 to 2017). Equation 1 is a first-order dynamic panel model, because the explanatory variables on the right-hand side include the first lag of the dependent variable ($y_{i, t-1}$). The composed error term in parentheses combines an individual specific random effect to control for all unobservable effects on the dependent

variable that are unique to the individual and do not vary over time (α_i), which captures specific ignorance about observed home country's MNEs i , and an error that varies over both home country's MNEs and time (ϵ_{it}), which captures our general ignorance of the determinates of y_{it} . However, this cannot be estimated accurately by OLS or by fixed effects estimation. An OLS estimator of β in equation 1 is inconsistent, because the explanatory variable $y_{i,t-1}$ is positively correlated with the error term due to the presence of individual effects. A fixed effects estimation does not have this inconsistency because the equation is transformed to remove the individual effect, as in equation 2.

$$y_{it} - y_{i,t-1} = \beta(y_{i,t-1} - y_{i,t-2}) + (\epsilon_{it} - \epsilon_{i,t-1}) \dots \dots \dots (2)$$

The sys-GMM enables the explanatory variables to be treated as potentially endogenous or exogenous. This is potentially important for IB research, enabling the investigation of variables that may once have been verboten (as well as being better suited than standard models for determining coefficients for time invariant variables). However, equation (2) exhibits the different problem of correlation between the transformed lagged dependent variable and transformed error term. Here the overall impact of the correlations is negative, and is the well-known Nickell (1981) bias. Bond (2002) states that these biases can be used to provide an informal test for an estimator of the lagged dependent variable: the estimated coefficient should be bounded below by the outcome from OLS (which gives the maximum upwards bias) but above by the fixed effects estimate (which gives the maximum downwards bias). Due to these problems, the standard approach is to find a suitable instrument that is correlated with the potentially endogenous variable (the more strongly correlated the better), but uncorrelated with ϵ_{it} . With GMM, instrumentation is not confined to one instrument per parameter to be

estimated, the possibility exists of defining more than one moment condition per parameter to be estimated. It is this possibility that is exploited in the GMM estimation of dynamic panel models, first proposed by Holtz-Eakin et al. (1988). The two models popularly implemented are the “difference” GMM estimator (Arellano and Bond, 1991) and the “system” GMM estimator (Arellano and Bover 1995). Greene (2002, p.308) explains that suitable instruments come from within the dataset: the lagged difference ($y_{it-2} - y_{it-3}$); and the lagged level y_{it-2} . Both of these should satisfy the two conditions for valid instruments, since they are likely to be highly correlated with $(y_{it-1} - y_{it-2})$ but not with $(\varepsilon_{it} - \varepsilon_{it-1})$.

It is this easy availability of such “internal” instruments (i.e. from within the dataset) that the GMM estimators exploit. The “difference” GMM estimator follows the Arellano and Bond (1991) data transformation, where differences are instrumented by levels. The “system” GMM estimator adds to this one extra layer of instrumentation where the original levels are instrumented with differences (Arellano and Bover 1995). For three main reasons, system GMM is used rather than difference GMM. Firstly, system GMM allows for more instruments and can dramatically improve efficiency (compared to difference GMM) (Roodman 2009, p.86). Secondly, any gaps in a panel sample is unbalanced - are magnified by difference GMM when compared to system GMM. Indeed this was a motivating factor for the creation and development of system GMM (Roodman 2009, p. 104). Thirdly, unlike difference GMM, system GMM does not expunge the fixed effects which are important in IB research.

Before estimating any dynamic panel model there are two important (and linked) considerations. Firstly, which of the regressors are to be treated as potentially endogenous and which strictly exogenous? Secondly, how many instruments to use? There are diagnostic tests available to help with this choice of endogeneity or exogeneity, and other relevant tests to further enhance the reliability of the study results. The choice of which regressors are to be

treated as endogenous and exogenous is coupled with the consideration of how many instruments should be used, because that choice, in part, generates the instruments.

A high number of regressors treated as endogenous means that a higher number of instruments are employed, *ceteris paribus*. Researchers can also affect the instrument count by changing the lag length to be used for instrumentation, and good practice is to test results for their robustness to different lag length choices (and hence different instrument counts). Diagnostic tests are available for the appropriateness of the instrumentation collectively, and also for the subsets of instruments created by the regressors that are treated as exogenous or endogenous, as well as those generated by the lagged dependent variable. In STATA, the *xtabond2* command contains a built in check on first and second order autocorrelation in first differences, which is an additional check on the appropriateness of the instrumentation. The diagnostics of the chosen model should indicate that first order autocorrelation is present, but second order is not. The J tests, Hansen and Sargan, inspect all the generated instruments together, with a null hypothesis of exogenous instruments. Low p-values mean that the instruments are not exogenous and thus do not satisfy the orthogonality conditions for their use.

In IB research, some of the GMM studies do not test (or at least report) the Hansen J test result, hence, this study used Sargan test to examine the validity of the study instruments. Other pre-diagnostic tests also considered in this study are issues of multicollinearity and heteroscedasticity. This research employs both correlation matrix of predictor variables to detect if they are highly correlated usually above 0.80 or 0.90 as well as, the value of Tolerance (value should not be less than .10) and Variance Inflators Factors (value should not be above 10). Any evidence of heteroscedasticity in this research is addressed with the use of VCE robust standard errors in STATA software.

In order to meet the required dataset distributional assumptions, like normality of the dataset, a log base 10 transformation was done for all variables employed (consistent with; Kumar,

2001). Conducting a log base 10 transformation not only improve the symmetry of data distribution but also help to minimise or eliminate other potential problems associated with heteroskedasticity and endogeneity in the study model (Saunders and Thornhill, 2012). The conditions that warranted the need for log transformation in this study is that, it was observed that the study dataset had large mean variations which may led to skewness in the data distribution (Allan and Randy, 2005). However, in this study all the variables used in the models (developed in empirical chapters) are expressed in ratios with the numerator data for the host countries (i.e. Nigeria) divided by the denominator represents data for home countries. Expressing the dataset in ratios have the advantage of minimising skewness of the dataset and, also eliminate the effect of inflation on monetary data (Saunders and Thornhill, 2012). Expressing the dataset in ratios, may not completely eliminate mean variations. A log10 transformation became necessary to equalise the variation squeezing the groups with the larger standard deviations and stretching data with the smaller values and standard deviations (Allan and Randy, 2005; Saunders and Thornhill, 2012).

6.8 Chapter Summary

This chapter provides an extensive review of the methodological literature through the review of alternative research paradigms, designs and philosophies for conducting academic research. The chapter also showed the choice of research methods and methodologies on either a specific or a combination of chosen paradigms and philosophies. The research design, methodology and methods used in this study is the quantitative research design approach, and this quantitative data is analysed using STATA analytical. This approach is considered appropriate because this study seeks to investigate the determinants of Nigeria's Oil and Gas FDI and its impact on economic growth and international trade. This approach corroborates with previous studies on 'determinants' and 'impact' in the IB and FDI literature.

7.0 Chapter Seven: Analysis and Discussion of the Determinants of Oil and Gas FDI in Nigeria

7.1 Introduction

As elaborately discussed in Section 1.2 in Chapter One (on the rationale of the study), in Chapter 3 (which provides the underpinning theoretical and conceptual framework of the determinants of oil and gas FDI in Nigeria. This current chapter aims to carry out an empirical analysis examining the determinants of oil and gas FDI into Nigeria as a whole and from OECD and non-OECD countries into Nigeria. This analysis will provide empirical evidence as to the most important determinants of oil and gas FDI in Nigeria and that from OECD and non-OECD countries. The chapter is structured into six main sections as follows: after the introduction, the next section explains the study sample and study model. The third section discussed the dependent variable used in this chapter. The fourth section discusses the independent variables for both predictive and control variables. The fifth section discusses the empirical results synthesised with the relevant empirical literature. The sixth section discusses the findings. The last section summarises the chapter.

7.2 Sample and Study Model

As discussed in Chapter 6, this study follows a deductive research approach based on a quantitative research method. The dataset used in this chapter covers a period of 17 years from 2001 to 2017, making a total of 306 observations. The dataset is analysed in three separate models; at the country-level as a whole, the OECD group and the non-OECD group. The OECD countries group is made up of 204 observations and non-OECD countries group is made up of 102 observations. The dataset will be analysed using dynamic panel data analysis proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment). The study model developed here aims to analyse determinants of oil and

gas FDI in Nigeria. Variables in equation (1) are in line with the study analytical framework developed from the reviewed extant empirical literature on FDI in Nigeria and other developing countries. Specifically, the equation captures the effect of Market seeking FDI, Resource seeking FDI, Efficiency seeking FDI, Policy liberalisation factors, Infrastructural factors, and Institutional/Political risk factors on FDI inflows in Nigeria's oil and gas industry.

$$FDI_{it} = \alpha + \beta_1 Market-seeking_{it} + \beta_2 Efficiency-seeking_{it} + \beta_3 Natural\ resource-seeking_{it} + \beta_4 Trade\ Openness_{it} + \beta_5 Infrastructure_{it} + \beta_6 Institutional/political\ risk_{it} + \beta_7 Policy-liberalisation_{it} + \beta_8 FDI_{it-1} + \beta_8 FinancialCrisis + \varepsilon_{it} \dots \dots \dots (1)$$

Where ε_{it} represents the error term.

7.3 Dependent Variable

Given due consideration to the availability of FDI data within the research context, the dependent variable for this study will be FDI capital expenditures by foreign MNEs in Nigeria oil and gas industry. The data for oil and gas FDI includes for all three sectors: the downstream sector, midstream sector and upstream sector published by Nigeria Bureau of Statistics and Central Bank of Nigeria. The choice for FDI capital expenditure as the dependent variable is due to the lack of availability for other potential proxies, like project count variable or job data. Also, FDI capital expenditure happens to be widely used in FDI empirical studies and within the study context (see, Obwona, 2001; Kyereboah-Coleman and Agyire-Tettey, 2008; Udoh and Egwaikhide, 2008; Dauda, 2009; Wafure and Nurudeen, 2010).

7.4 Independent Variables and Justification

The choice of independent variables for this study is identified from extant empirical studies which form the study analytical framework. Table 9 shows the study variables used in this analysis. The study examines three main determinants of FDI including market-seeking; efficiency-seeking; and natural resource-seeking. In Model (1) above, the first predictive

variable is market-seeking (proxied by GDP per capita). Studies have shown that market size, measured by GDP, GDP per capita, GNP, or GNP per capita, has a significant effect on inward FDI (Zhang, 2000; Wei and Liu, 2001). These authors argue that rapid economic growth creates large domestic markets and business opportunities for foreign firms to invest. For instance, Swain and Zhang (1997) analysing data of FDI in China in the period of 1978-92, used GDP and real GDP growth rate; Liu et al (1997) using GDP, GDP growth, wages, concluded that market size is the fourth most important economic factors for the pledged FDI in China. In the case of Nigeria, Abdul (2007) using panel data and regression analysis further reveal that large domestic market, high growth rate, modern infrastructure and friendly business environment are important in attracting FDI. These results also found support from Dauda (2009) and Ibrahim and Sadiat (2009). The second predictive variable in Model (2) is efficiency-seeking (proxied by labour force). Using labour force as a measure of efficiency-seeking motivation is in line with studies such as Liu et al (1997) and Zhang and Yuk (2000). These studies showed that foreign firms can take advantage of low-cost labour force by investing in developing countries. Zhang and Yuk (2000) found that China's relative cheap labour force greatly encourage HK Multinationals to invest in Mainland China. Noorbakhsh *et al.*, (1999) showed that the availability of low-cost unskilled labour was a prominent location-specific determinant of FDI in developing countries. Ajayi (2006) showed that labour force (slitted according to levels of skills and cost) are determinants of FDI. In terms of natural resource-seeking the study employs fuel export as a proxy. This is consistent to previous studies along this line of research enquiry (Asiedu, 2006; Mohamed and Sidiropoulos, 2010; Mhlana et al., 2010). In IB research, the consensus is that firms can increase their competitiveness by investing in certain locations that offer access to particular natural resources of better quality and for a lower real cost than in the country of origin (Dunning and Lundan, 2008). Dunning and Lundan (2008) further reiterated that such locations ensure minimisation of production costs and security of

sources of supply. Hence, a statistically significant positive relation is thus expected for factor endowments of natural resources and FDI (see Table 9 below). Asiedu (2006) used the weight of fuel and mineral exports in total exports since their sample was based on Sub-Saharan African nations that have enormous endowments of fuel and minerals, and reported a statistically significant positive relation. Mohamed and Sidiropoulos (2010) only used fuel, because this is the natural resource of relevance in the Middle East and North Africa (MENA) countries and found similar results as Asiedu (2006). Mhlanga et al. (2010), who used a dummy variable to measure natural resource endowments in SADC countries, and found inconclusive results.

Insert Table 9 here

7.5 Empirical Analysis and Key Findings

Insert Table 10 and 11 here

Before empirically proffering solutions to the research questions, the study conducted several pre- and post-estimation tests with a view to providing valid and reliable results. The pre-estimation tests include normality, multicollinearity and heteroskedasticity tests. In terms of normality, Appendix 1 presents the descriptive statistics, showing the key features of the study dataset (in relative terms) before log transformation and Appendix 2 shows the key features after log transformation. Based on the pooled dataset, the average of FDI was 1257, with a maximum of 20562 and standard deviation of 36.27. Similar patterns were also observed for other variables (such as; GDP, labour force, fuel export, trade, rule of law, mobile subscription, interest rate, and technology). As shown in Appendix 1, it is observed that the dataset has unequal variation with a large mean and large standard deviations. In order to conform the dataset to normality, a log10 transformation became necessary to equalise the variation squeezing the groups with the larger standard deviations, and stretching data with the smaller

values and standard deviations as exhibited in Appendix 2 (Saunders & Thornhill, 2012). This was done for all the study variables with a prefix “In” with each variable.

For the multicollinearity test, both the collinearity table matrix and VIF test was conducted. Multicollinearity exists if the study variables are highly correlated usually above 80% or 90% of the correlation matrix or the VIF value should not be above 10 or tolerance values not less than 0.10. In Table 10 and Table 11, there is no multicollinearity problem present in the calculated matrix. Usually, resolving problems associated with multicollinearity is usually by including only one of the variables at a time in the estimated model. This procedure would have been used in this study, as there is no sufficient evidence to support the multicollinearity problem. Another pre-estimation test employed for this study is the Breusch-Pagan / Cook-Weisberg test for heteroskedasticity. The test shows that the study dataset shows evidence heteroskedasticity problem and hence, will be resolved using VCE robust standard errors in every estimation. As per the post-estimation tests, three tests are conducted including Wald test, Arallano-Bond test for autocorrelation and Sargan test of overidentification restrictions on instrumental variables. The results of the post-estimated tests would be explained after every estimated model.

Insert Table 12 here

Table 12 shows the empirical results of the study country-level analysis for inward FDI into Nigeria as a whole, by OECD and non-OECD countries using sys-GMM estimation. The *Wald* diagnostic test indicates that the models have sufficient explanatory power to explain the changes in oil and gas FDI and the results of the first-order and second-order serial correlation (AR1 and AR2) indicate that the error term from the models does not exhibit second-order serial correlation (Cameron and Trivedi 2010) while the results of the Sargan test confirmed that there is no problem with the validity of instruments used.

As shown in Table 12, GDP per capita as a proxy for market-seeking is seen to be positively significant for country-level at 5% level of significance (with coefficient 0.0245), OECD at 10% level of significance (with coefficient 0.3369) and non-OECD countries at 10% level of significance (with coefficient 0.0083). This empirical evidence provides statistical support for H1, H1a and H1b. For resource-seeking motivation, fuel export is statistically significant at 10% level (with coefficient 0.0341) as a whole, OECD at 10% level of significance (with coefficient 0.1736) and non-OECD countries at 1% level of significance (with coefficient 0.2915). This provides statistical support for H2, H2a and H2b. The proxy for efficiency-seeking (Labour Force) is positive and statistically significant at 1% level for Nigeria as a whole and OECD countries estimated observations with coefficient 0.1149 and 0.2095 respectively, and non-OECD with coefficient 0.0887 at 10% level of significance. This provides statistical support for H3, H3a and H3b.

As per the study control variables, oil and gas FDI lagged one year is positive and statistically significant in all estimated models. Trade (proxied by the sum of import and export) is positive and statistically significant at 1% level of significance (with coefficient 0.1201) as a whole, OECD at 1% level of significance (with coefficient 0.1556) and non-OECD countries at 1% level of significance (with coefficient 0.1667). The proxy for institutional/political risk is the rule of law and as expected it is negative but only statistically significant for non-OECD countries at 10% level of significance. As per infrastructure, proxied by mobile subscription it is positive and statistically significant at 5% level of significance (with coefficient 0.0553) as a whole, OECD at 5% level of significance (with coefficient 0.9607) and non-OECD countries at 1% level of significance (with coefficient 0.3791). In terms of policy liberalisation (proxy by interest rate) is negative but statistically significant for country level, OECD and non-OECD countries. The financial crisis was found to be insignificant for all the study observations.

7.6 Discussion of Results

This study empirical results show that OECD countries are more attracted by market-seeking and efficiency-seeking, while, non-OECD are more attracted by resource-seeking motivation. These empirical results corroborate with prior studies such as Chakrabarti (2001), Vial (2002), Frenkel et al. (2004), Carstensen and Toubal (2004), Nunes and Oscategui (2006), Moosa and Cardak (2006), Ang (2008). These authors argued that the size of the domestic market could attract more FDI inflows due to the benefits of the economies of scale and to exploit potential economic prospect. Jordaan (2004) argued that market-seeking FDI is attracted to markets (with greater purchasing power), where firms can potentially receive a higher return on their capital and by implication receive higher profit from their investments. This study empirical results also draw support from Nunes and Oscategui (2006), who examined 15 Latin American countries and found a positive relationship between market size (measured by GDP) and FDI. Ang (2008) showed that a 1% increase in real GDP would lead to about 0.95% increase in inward FDI, representing an almost one-to-one relationship. These findings are similar with other empirical studies, like Chakrabarti (2001) after employing extreme bound analysis on a cross-section dataset of 135 countries, reported that market size (as measured by per-capita GDP) attracts FDI. Moosa and Cardak (2006) reported evidence in support of positive influence of market size (as measured by real GDP) effect on FDI. Resmini (2000) found that market size (as measured by GDP per capita and population size) are positively associated with FDI. These results suggest that the size of the domestic market influence more FDI inflows due to the benefits of the economies of scale and exploit potential economic prospect. Empirical studies in the case of Nigeria also show a positive association between market condition (either proxy by size or growth rate) and general FDI inflows. However, little is known on the effect of market conditions and FDI in the oil and gas sector in Nigeria. Like every other investment, FDI in oil and gas can also be targeted on the domestic market to meet the demand in the midstream/downstream industry of the sector (e.g., refining, transportation and marketing of

petroleum products). As such, the potential demand for FDI output becomes a relevant factor in investment decision choice.

The study also found that oil and gas FDI in Nigeria is positively influenced by natural resource-seeking (proxied by fuel export) for all the study observations including country-level, OECD and non-OECD countries, but with the non-OECD countries having a higher desire for resources-seeking due to the size of the study estimated coefficient. These empirical results corroborate with prior studies such as Morisset (2000), Asiedu (2002), Mohamed and Sidiropoulos (2010) and Pan (2016). Countries like Angola, Botswana, Namibia and Nigeria have received foreign investment targeted at the oil and minerals sectors, Asiedu (2006), reported that countries that are endowed with natural resources attract more FDI. Dauda and Stein (2007) reported that endowments of natural resources are significant determinants of FDI in Nigeria. Resource-seeking motivations occur as a result of the availability of natural resources at a relatively lower cost in host countries compared to home countries. Natural resource seeking FDI is dependent on the fact that such resources desired for are location specific. Dunning (1993) emphasised the need to guarantee a cheaper and safer supply of natural resources to justify much of the FDI inflows in the 1800s and the nearly 1900's mostly to less developed areas of the globe from the most industrialised nations which are Europe, USA and Japan.

The study also found that oil and gas FDI in Nigeria is positively influenced by efficiency-seeking (proxied by labour force) for all the study observations including country-level, OECD and non-OECD countries. But with the OECD countries having a higher desire for efficiency-seeking due to the size of the study estimated coefficient. These findings are consistent with previous studies that showed that MNEs take advantage of differences in factor costs among locations (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007; Sadig, 2009; Vijayakumar et al., 2010). Here, FDI by MNEs from higher-cost regions into low-cost regions in order to reduce

costs and gain efficiency. Dasgupta et al. (1996) supported this view when they revealed that Japanese MNEs are more interested in low wage labour in their FDI in Asia. Root and Ahmed (1979) found that human capital and skilled labour are not a significant determinant of FDI inflows for 58 developing countries examined in their study. Narula (2002) contrast the results with those obtained for 18 industrialised countries, where technological capability and human skills are found to be highly significant and correctly signed. Narula (2002) argued that the inward investment into industrialised countries is increasingly aimed at seeking complementary created assets, unlike developing countries. Efficiency-seeking FDI exploits the existing competitive advantages of the firm in a short-to-medium term but does not essentially transform its core competence in enhancing long-term competitiveness. Efficiency-seeking FDI engaged in by firms intend to increase efficiency through the exploitation of economies of scope and scale, as well as common ownership. Dunning (1993) suggested that efficiency-seeking FDI usually comes in effect after either market or resource seeking FDI are realised thereby increasing the profitability of the firms. Scholars have argued that an efficiency-seeking FDI occurs as a result of investors that seek locations with a lower cost for its operations especially with regards to labour as low labour costs attract more investment in host countries.

With regards to trade which is the sum of exports and imports respectively, the study also found that oil and gas FDI in Nigeria is positively influenced by trade and is significant for all the study observations including country-level, OECD and non-OECD countries. The results show that more imports from home countries lead to less FDI from the OECD and the non-OECD countries when regressed separately, indicating therefore that import (as a proxy for trade liberalisation) and FDI are substitutes. Also, export is negative when separately regressed and has a significant effect on Nigeria's FDI indicating that export does not attract foreign investors. Vijayakumar et al. (2010) found an insignificant effect of trade openness on FDI

inflows in BRICS countries. Liargovas and Skandalis (2012) utilised the eight measures of trade openness and found a positive impact of trade openness in attracting FDI in the developing economies. Belloumi (2014) also established the long-term relationship between trade openness and FDI in Tunisia. Khan and Hye (2014) argued that trade liberalisation implies a lower level of tariffs and trade restrictions for foreign investors who seek cost efficiency. Shah and Samdani (2015) documented the positive effect of trade liberalisation on FDI inflows in D-8 countries. Zaman, Donghui, Yasin, Zaman, and Imran (2018) also found a positive impact of trade openness on FDI inflows along with other determinants such as exchange rate, GDP per capita and inflation. Nieman and Thies (2018) and Camarero, Gómez-Herrera and Tamarit (2018) evidenced the complementary relation between FDI and trade openness in EU countries. Sahin (2018) evidenced the long-term bi-directional causal relationship between international trade and FDI in BRICS countries.

The empirical results show that interest rates as a proxy for policy liberalisation have a negative effect on pooled country level and OECD countries, but insignificant results were found for non- OECD countries. The negative effect on pooled and OECD countries compared to the non-OECD corroborate the work of Kisto (2017) where the concept is that there is a low-interest rate to where there is a high-interest rate until the interest rate is equal everywhere, assuming that no barriers to capital movement such as risks, and uncertainties exist. Moosa (2002) argued that the effect of the exchange rate on FDI could be uncertain as it depends upon the destination of goods produced by MNCS in the host country. Aqeel and Nishat (2004) and Lily et al. (2014) showed the negative effect of currency depreciation on FDI inflows; in this case currency appreciation increases the expected returns on FDI for foreign investors. Ain and Naseem (2017) documented the positive effect of currency devaluation on FDI because it provides foreign investors to increase their wealth by transferring investments to host country like Pakistan. Chowdhury and Mavrotas (2006) identified the bidirectional causal relation

between economic growth and FDI. On the other hand, Hansen and Rand (2006) made an empirical investigation of 31 developing countries and they found that economic growth does not lead to higher FDI inflows in the host country; it is rather FDI that stimulates economic growth through technology transfer and knowledge transmission to the host economy. Khan and Hye (2014) found insignificant effect of economic growth on FDI inflows in Pakistan. Similarly, Belloumi (2014) found inconclusive results of economic growth on FDI.

The importance of infrastructure and its attendant development to FDI flows was measured by mobile cellular subscriptions and found to be significantly related to FDI for the country-level, OECD and non-OECD countries. This finding is consistent with other results from Campos and Kinoshita's (2003) as well as Okafor (2014) as this type of infrastructure is positively influenced by mobile cellular subscriptions. Although, it can be deduced from the larger section of FDI literature that the level of infrastructure development for Africa has received very little attention as well as low levels of FDI in comparison to other regions (Kariuki, 2015). Also, some other authors such as (Dupasquier and Osakwe, 2006) did not find infrastructure to be a significant variable for FDI.

This study also examined the rule of law as well as financial crisis, this study found that both had negative relationship with FDI inflows; this suggests that inflows from both OECD and non-OECD countries in Nigeria's OGFDI were deterred during the financial crisis but insignificant. Studies by Bevan and Estrin (2004) observed that the rule of law, if upheld, has an impact on FDI inflows since they affected the magnitude of investment, choice of entry mode, probability of survival and variety of international expansion strategies. The findings of this study also corroborates similar results by Anyanwu (2012) who argued that the rule of law and the quality of institution didn't only attract FDI but it also creates the enabling environment and conditions to which domestic firms emerge and invest abroad. Hashmi et al. (2020) reported that FDI inflows are more positively influenced by military/authoritarian regime

exchange rate, trade openness and gross fixed capital formation. Madani and Nobakht (2014) reported the positive effect of democracy on FDI inflows in Upper-Middle-Income countries. Wisniewski and Pathan (2014) identified the positive impact of new dimensions of the political environment such as the presidential system, complete control of the executive government and long-standing history of political parties on FDI in OECD countries. Dang (2015) provided empirical evidence that political similarities between countries matter more for attracting FDI than democracy itself. They also concluded that MNCs do not invest in those countries where host governments spend excessive money on government spending, especially military expenditures. Nieman and Thies (2018) emphasised the role of democratic institutions in fostering property rights and attracting FDI in both developing and developed countries. Li (2009) investigated the effect of political regime on the expropriation of FDI by the host government in developing countries. He argued that democracies are less likely to be engaged in expropriation behaviour when there are long-term democracies and constraints on political leaders in the host country. Moreover, autocrat governments are less likely to expropriate foreign investors when such governments have long tenure and political constraints. However, Duanmu (2014) argued that state controlled MNEs use the influence of the home country to make investments in the host country and affect the expropriation risk in the host country. However, the level of such expropriation risk depends upon the economic dependence of the host country in the home country. Bastiaens (2016) investigated the positive effect of international investment contracts and the role of public deliberations in policymaking in authoritarian regimes for attracting FDI. He argued that though democracies are typically perceived as having lower political risk, authoritarian countries can substantially attract FDI by devising investors' friendly policies. However, abusive or authoritarian regimes are associated with human rights violations and may deter FDI inflows (Hashmi et al., 2020). Also, the positive and significant coefficients reported for the self-reinforcing effects of oil and gas

FDI are consistent with findings reported in Zheng (2009), which adopted similar measures of FDI self-reinforcing effects and reported positive results. The implication of these results is that positive externalities from previous FDIs are an indication of the present condition, and the future prospects of the host location. Self-reinforcing effects also reflect the concentration of economic activities that give rise to economies of scale and positive externalities.

7.7 Chapter Summary

This chapter conducted an empirical analysis of the determinants of oil and gas FDI in Nigeria. This empirical evidence provides statistical support that inward oil and gas FDI in Nigeria (as a whole) is determined by market-seeking (proxied by GDP per capita), resource-seeking (proxied by fuel export) and efficiency-seeking (proxied by labour force). However, the study further reveals that these results differ when compared between OECD countries vs non-OECD countries FDI in Nigeria. The empirical results show that OECD countries are more attracted by market-seeking and efficiency-seeking, while the non-OECD countries have a higher desire for resources-seeking due to the size of the study estimated coefficients. In terms of the study control variables, it is observed that oil and gas FDI in Nigeria is positively influenced by trade for all the study observations (including pooled country-level, OECD and non-OECD countries). Interest rates as a proxy for policy liberalisation have a negative effect on pooled country level and OECD countries, but insignificant results were found for non-OECD countries. Infrastructure (measured by mobile cellular subscriptions) was found to be significantly related to FDI for the country-level, OECD and non-OECD countries. Rule of law and financial crisis although insignificant, both are found to have negative impact on oil and gas FDI inflows from OECD and non-OECD countries to Nigeria. Lastly, the study also controls for previous years oil and gas FDI into Nigeria (lagged one year). This was found to

have positive and significant impact on oil and gas FDI in Nigeria but with non-OECD countries having a higher impact.

8.0 Chapter Eight: Analysis and Discussion on the Impact of Oil and Gas FDI on Nigeria's Economic Growth

8.1 Introduction

As discussed in Section 1.2, on the rationale of the research gap and also in Chapter 4, which provides the literature review on the theories of FDI and economic growth, and the conceptual framework and hypothesis development about the impact of oil and gas FDI in Nigeria, this current chapter aims to carry out an empirical analysis of the impact of oil and gas FDI in Nigeria. In addition, the empirical analysis will also examine the impact of oil and gas FDI from OECD and non-OECD countries into Nigeria. This analysis will provide empirical evidence on the impact of oil and gas FDI in Nigeria and that from OECD and non-OECD countries. The chapter is structured into six main sections as follows: after the introduction, the next section explains the study sample and study model. The third section discusses the dependent variable used in this chapter. The fourth section discusses the independent variables for both predictive and control variables. The fifth section discusses the empirical results synthesised with the relevant empirical literature. The sixth section discusses the results.

8.2 Sample and Study Model

This study follows a deductive research approach based on a quantitative research method. The dataset used in this chapter covers a period of 17 years from 2001 to 2017 making a total observation of 306 and then grouped into OECD and non-OECD countries with 204 and 102 observations respectively. The dataset is analysed using dynamic panel data analysis proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment). The main purpose of the chapter is to investigate the impact of FDI on economic growth in Nigeria. The study model is based on the endogenous growth theory, based on the assumption that FDI contributes to economic growth directly and

indirectly through several other factors to bring about technical progress and human capital development. These other independent variables which are assumed typically to influence the economic growth will be included in the model in line with H4 to H8. Thus, in order to test the hypotheses of this study empirically, the effects of FDI on economic growth, the study model are modified as follows:

$$gdp = a + b_1 FDI + b_2 HC + b_3 TRD + b_4 TECH + b_5 INST + b_6 Control\ variable + e$$

GDP represents the Dependent Variable proxy by GDP per capita, and the Independent Variables are: *FDI* represents FDI inflows, *HC* represents human capital proxy by share of secondary school and university enrolment in the population, *TRD* the trade measured by the ratio of exports and import as a percentage of GDP. *TECH* represents technology proxy by the ratio of FDI inflows to GDP, and *INST* represents institutional quality proxy by the number of violent riots and politically motivated strikes. All the variables used in the above model are expressed in ratios with the numerator data for the host countries divided by the denominator represents data for home countries

8.3 Dependent Variable

GDP as a dependent variable measure the market size and economic growth in this case Nigeria. Several studies have used a different measure of GDP. For example, Tang et al. (2008), Jayachandran and Seilan (2010), Elboiashi (2011), and Asghar et al. (2011) utilise real GDP as a proxy of economic growth. Contrastingly, other studies like Mencinger (2003), Frimpong and Oteng-Abayie (2006), and Lo et al. (2013) utilise annual GDP growth rate to measure economic growth. For this study, the Dependent Variable proxy by annual GDP growth will be obtained from the World Bank (World Development Indicators, 2016). In the case of this

study, two measures of GDP were considered as alternatives to each other this includes GDP per capita and GDP per annual growth. After several analyses, GDP per capita was found to be the best performing variable for this study in examining FDI-growth nexus.

8.4 Independent Variable

On the predictive effect, FDI is expected to have a significant positive effect on the growth of the host economy due to the transfer of technology and improved management expertise to boost competition and performance for both foreign and local firms (Ayanwale, 2007; Koojaroenprasit, 2012; Melnyk et al., 2014; Otto et al., 2014). [FDI inflows data will be obtained from the several published reports by the CBN, NBS, FT.](#) Another predictive variable is human capital development, and this study follows the argument that the rate of economic growth is affected by the stock of human capital in the host country (Ayanwale, 2007; Koojaroenprasit, 2012). Thus, human capital development will be proxied using data on labour force also obtained from the World Bank's World Development Indicators report. Another predictive variable for this study is trade openness. It expected that an open economy to trade increase competitiveness which also has effects on increased export or import, investments, foreign exchange, employment, productivity and then, economic growth (Borensztein *et al.*, 1998; Wei *et al.*, 2001).

The role of technology transfer through FDI in economic development has been established in the literature (Olofsodotter, 1998; Carkovic and Levine, 2002; Ayanwale, 2007). Thus, another predictive variable for this study is [the ratio of oil and gas FDI inflows to GDP](#) measuring knowledge transfers and adaptation to new technology brought along by FDI inflows obtained from the World Bank's World Development Indicators. This proxy has been used by Elboiashi (2011) in a study of impact FDI on economic growth in developing countries. Another predictive variable for this study is institutional quality. The measure for institutional quality in the context of Nigeria reflects the level of political stability. Political stability is usually

measured by the probability of a change of government, as well as political violence as measured by the sum of the frequency of political assassinations, violent riots and politically motivated strikes (Ayanwale, 2007). It is widely acknowledged that when a country is politically unstable its economic growth is hindered. Political instability is proxied by [data on rule of law obtained](#) from the Nigeria Bureau of Statistics. Authors [such as Henisz \(2000\), Jensen \(2008\), Li and Resnick \(2003\)](#) have shown that [strong courts and adherence to the rule of law also contribute to political stability, a matter of serious concern for both foreign and domestic investors](#). In addition, Wheeler and Mody (1992) argued that the quality of infrastructure reduces operating costs, facilitates production and thereby promotes FDI. Hence, good infrastructure should increase productivity which in turn promotes economic growth. Infrastructure is proxied by data on mobile phone subscriptions. See Table 13 below for a detailed description of the study variables. In terms of the control variables, the study control for the effect of previous economic growth (GDP lagged one year) and financial crisis (proxied using a dummy variable) (this is consistent with Zheng, 2009).

Insert Table 13 here

8.5 Empirical Analysis and Key Findings

Insert Tables 14, 15 and 16 here

Before empirically proffering solutions to the research questions, the study conducted several pre- and post-estimation tests with a view to providing valid and reliable results. The pre-estimation tests include normality, multicollinearity and heteroskedasticity tests. In terms of normality, [Appendix 1 presents the descriptive statistics, showing the key features of the study dataset \(in relative terms\) before log transformation and Appendix 2 shows the key features after log transformation](#). Based on the pooled dataset, the average of FDI was 1257, with a maximum of 20562 and standard deviation of 36.27. Similar patterns were also observed for other variables (such as; GDP, labour force, fuel export, trade, rule of law, mobile subscription,

interest rate, and technology). As shown in Appendix 1, it is observed that the dataset has unequal variation with a large mean and large standard deviations. In order to conform the dataset to normality, a log10 transformation became necessary to equalise the variation squeezing the groups with the larger standard deviations, and stretching data with the smaller values and standard deviations as exhibited in Appendix 2 (Saunders & Thornhill, 2012). This was done for all the study variables with a prefix “ln” with each variable.

For the multicollinearity test in Tables 14 and 15, the summary shows that there is no multicollinearity problem. Multicollinearity exists if the study variables are highly correlated usually above 80% or 90% of the correlation matrix or the VIF value should not be above 10 or tolerance values not less than 0.10. Table 16 presents empirical results from the dynamic panel data analyses conducted on the impact of oil and gas FDI on economic growth in Nigeria. This study employed GDP per capita as proxy for the dependent variable. Table 16 shows the empirical results for aggregated country-level, OECD and non-OECD countries groups.

As shown in Table 16, inward oil and gas FDI in Nigeria has a significant positive effect on economic growth for country-level at 10% level (with coefficient 0.0427), OECD at 10% level (with coefficient 0.6711) and non-OECD countries at 5% level (with coefficient 0.0153), this provides statistical support for H4, H4a and H4b. Human capital (proxied by labour force) shows that the labour force influences the impact of oil and gas FDI on economic growth in Nigeria for all the study observations, as shown in Table 16 with significance level for country-level at 1% level (with coefficient 0.1149), OECD at 5% level (with coefficient 0.2095) and non-OECD countries at 10% (with coefficient 0.0887), this provides statistical support for H5. Trade liberalisation proxied by international trade (sum of total import and export), has a significant positive impact on Nigeria’s economic growth for country-level at 5% level (with coefficient 0.1201), OECD at 5% level (with coefficient 0.1556) and non-OECD countries at 5% level (with coefficient 0.1667), this provides statistical support for H6. Infrastructure

proxied by mobile phone subscription shows that mobile phones subscriptions have a significant positive effect on Nigeria's economic growth for country-level at 1% level (with coefficient 0.0414), OECD at 5% level (with coefficient 0.8800) and non-OECD countries at 5% level (with coefficient 2.7993). This thus provides statistical support for H7. Political/institutional influence proxied by the rule of law the results show that rule of law has a significant negative effect on Nigeria's economic growth at 1% level for all estimated models. This thus provides statistical support for H8.

The *Wald* diagnostic test indicates that the models have sufficient explanatory power to explain the changes in oil and gas FDI and the results of the first-order and second-order serial correlation (AR1 and AR2) indicate that the error term from the models does not exhibit second-order serial correlation (Cameron and Trivedi 2010) while the results of the Sargan test confirmed that there is no problem with the validity of instruments used.

8.6 Discussion of Findings

This study empirical results show that OGFDI has a significant positive effect on Nigeria's economic growth. However, OGFDI from OECD countries have higher positive effect on Nigeria's economic growth than non-OECD countries OGFDI in Nigeria (due to the size of the estimated coefficient in Table 16). These findings corroborate with the body of literature that has documented a positive effect of FDI on economic growth (Amna et al., 2010; Benmamoun and Lehnert, 2013; Manelle and Mohamed, 2012). In the case of evidence from Nigeria, Ogiogio (1995) reports negative contributions of public investment to GDP growth in Nigeria for reasons of distortions. Aluko (1961), Brown (1962) and Obinna (1983) report positive linkages between FDI and economic growth in Nigeria. Endozien (1968) discusses the linkage effects of FDI on the Nigerian economy and submits that these have not been considered and that the broad linkage effects were lower than the Chenery–Watanabe average (Chenery and Watanabe, 1958). Oseghale and Amonkhienan (1987) found that FDI is positively associated

with GDP, concluding that greater inflow of FDI will spell a better economic performance for Nigeria. Ayanwale and Bamire (2001) assess the influence of FDI on firm-level productivity in Nigeria and report a positive spillover of foreign firms on domestic firm's productivity. Ayanwale and Bamire (2004) report a positive and significant effect of FDI on the productivity of both domestic and foreign firms in the Nigerian Agro/agro Allied sector. Ayashagba and Abachi (2002) explored the relationship between FDI and economic growth in Nigeria during the period from 1980 to 1997 and found that FDI had significant impact on economic growth. Ayanwale (2007) employing an augmented growth model ascertained the relationship between the FDI and economic growth and found that openness to trade and available human capital is, however, not FDI inducing but FDI was found to contribute to economic growth in Nigeria. In contrasts, Ariyo (1998) found that only private domestic investment consistently contributed to raising GDP growth rates during the period considered (1970–1995). In a study on the impact of FDI on economic growth in Nigeria, for the period from 1970 to 2001, Akinlo (2004) shows that both private capital and lagged foreign capital have little and not statistically significant effect on the economic growth. The results seem to support the argument that extractive FDI might not be growth-enhancing as much as manufacturing FDI. Ayadi (2009) investigates the relationship between FDI and economic growth in Nigeria (1980 – 2007) and reported a very weak correlation and causality between the variables and recommends that infrastructural development, human capital building and strategic policies towards attracting FDI should be intensified.

Unlike the findings that OGFDI from OECD countries have higher positive effect on Nigeria's economic growth than non-OECD countries OGFDI in Nigeria. Benmamoun and Lehnert (2013) applied GMM on 23 developing countries and revealed a positive and significant impact of FDI on economic growth. Likewise, Manelle and Mohamed (2012) applying panel data estimation revealed that FDI has positive and significant impacts on the economic growth of

MENA countries. The crux of the debate is that increase in competition and higher efficiency due to the presence of MNEs may help trigger lower product prices and hence, increasing consumers' spending or savings (Lahiri and Ono, 1998). Also, FDI can indirectly boost economic growth through employment opportunities by way of job creation (John, 2016). Koojaroenprasit (2012) attributed the higher efficiency of MNEs over domestic firms to augmentation of human capital through specialised training, technology and management expertise.

Falki (2009) added that FDI contributes significantly to human resource development and capital formation. Another channel in which FDI potentially boosts economic growth is through "crowding in" effects on domestic investments which ultimately create positive "spillover effects" of technology transfer, knowledge and human capital development on domestic firms (Onyali and Okafor, 2014). Likewise, Kumar and Pradham (2002) analysed the relationship between FDI, growth and domestic investment for a sample of 107 developing countries for the period from 1980 to 99. Their model used flow of output as the dependent variable and domestic and foreign-owned capital stock, labour, human skills, capital stock and total factor productivity as their independent variables. Their results showed that panel data estimations in a production function framework suggest a positive effect of FDI on growth, although FDI appears to crowd out domestic investments in net terms, in general, some countries have had favourable effects of FDI on domestic investments in net terms, suggesting a role for host country policies. Ogbekor (2005) examines the role of FDI on the growth of Namibian economy from 1991 to 2001. Using a combination of bivariate and multivariate variable models, the study concludes that FDI aids economic growth potential. Tang et.al (2008) explored the causal link between FDI, domestic investment and economic growth in China between 1988 and 2003 using the multivariate VAR and ECM. The results indicated that there is bi-directional causality between domestic investment and economic growth, while

there is a single directional causality from FDI to domestic investment and economic growth. A study conducted by Iamsiraroj and Ulubasoglu (2015) that focused on over 140 countries from 1970 to 2009 concluded that economic growth is positively affected by FDI. Kizilkaya et al. (2016), using panel cointegration to investigate the impact of FDI and HDI on economic growth for 39 countries, revealed that there is evidence of cointegration and positive impact of FDI and human capital on GDP.

In contrast, extant empirical study that has proposed negative effects of FDI on economic growth (Auty, 2001; Sach and Warner, 2001). For example, examining the contributions of foreign capital to the prosperity or poverty of LDCs, Oyinlola (1995) conceptualised foreign capital to include foreign loans, FDI and export earnings. Using Chenery and Stout's two-gap model he concluded that FDI has a negative effect on economic development in Nigeria. Auty (2001) and Sachs and Warner (2001) revealed that resource seeking FDI in abundant resource countries in Africa underperform and have less prosperity or economic growth when compared to countries without resources. Auty (2001) described the negative relationship between a nation's output and prosperity and natural resource abundance as natural resource curse. Sachs and Warner (2001) building upon the underlying assumptions of rentier state theory, claimed that resource wealth is linked to poor economic growth and other economic problems such as Dutch disease effects and poor performance of the agricultural and manufacturing sectors accompanied by an insufficient degree of diversification and extreme vulnerability towards external shocks. Some other studies have associated the resource curse by linking natural resources to violent conflicts (de Soysa 2000; Le Billon 2001). Obwona (2001) notes in his study of the determinants of FDI and their impact on growth in Uganda that macroeconomic policy, political stability and policy consistency are important parameters determining the flow of FDI into Uganda and that FDI affects growth positively but insignificantly. Athukorala (2003)'s study on the impact of FDI on economic growth in Sri Lanka between 1959 and 2002,

agrees that the regression results do not provide much support for the view of a robust link between FDI and growth in Sri Lanka. Chong-Sup Kim and Yeon-silkim (2008) found a negative relationship between Natural Resource Abundance and Economic Growth in Latin America. Gylfason and Zoega (2001), in a study of 85 countries from 1986 to 1988, identified that FDI in natural resources crowd out human capital, thereby inhibiting economic growth. Sala-i-Martin and Subramanian (2003) showed that heavy dependence on natural resources might hurt saving and investment indirectly by slowing down the development of the financial system. In a more recent study, Sengupta and Ntembe (2015) examined the impact of US FDI on economic growth in fourteen SSA countries but failed to find any evidence of the direct impact of US FDI on economic growth in the host countries.

The empirical findings also revealed that human capital (proxied by labour force) influence the impact of oil and gas FDI on economic growth in Nigeria. This corroborates with studies that showed that economic growth is an all-inclusive concept that relates to several other factors, for example, human capital, trade openness, technology, domestic investment and institutional quality (Kurtishi-Kastrati, 2013). Roy and Savio (2017) applied panel cointegration technique to investigate whether FDI affects economic growth using panel data for 27 Asian economies, their study showed that FDI is growth-enhancing in Asia and that the extent of its impact depends on the threshold levels of absorptive capacities (measured by the levels of human capital and infrastructure). Srivastava and Talwar (2020) explored the relationship between human development index (HDI), and FDI impact on GDP, and revealed that that HDI and FDI are the statistically significant variables that positively impact the changes in GDP. Srivastava and Talwar (2020) also showed that the impact of HDI is of a larger magnitude than FDI. Thus, this explains that absorptive capacity plays a vital role in determining the relationship between FDI and economic growth.

Baharumshah and Almasaied (2014), who explore the role of FDI in economic growth in Malaysia, found that by cooperating FDI with human capital the result is a positive effect of growth in both the short and long term. It explains that the educational system allows the country to receive more from the positive spillover effect of FDI. The researchers also stated that the factors of Malaysia's remarkable economic growth records over the past three decades were partly due to the contributions of education and financial institutions.

Suryandari (2014) explains that the notion of absorptive capacity is to use the investments to produce value that an economy needs investment in the development process to promote attempts to accumulate funds, create infrastructure, and construct financial activity. Suryandari (2014) further noted that absorptive capacity was associated with the efficiency or productivity of the capital invested and was defined as the acceptable rate of return on an investment in a specific economy. According to Tang and Zhang (2016), absorptive capacity in the host country determines the benefits from FDI. Therefore, the dependency of a host country's absorptive capacity throughout the whole FDI process is significant. Goldin (2014) explains the human capital as the skills owned by the labour forces which resulting in increased of an individual's productive capacity as it increased. The World Bank (2018) also define human capital similarly which is individual skills, health, knowledge and resilience. Plus, it highlights the importance of human capital investment which due to technological change, it caused the nature of work to evolve. Nguyen et al. (2009) argued that in order to receive benefits from FDI process, the host country is required to own a sufficient absorptive capacity related to human capital resources, the absorptive capacity of the domestic firm, financial system, technological, physical infrastructure, and institutional development. Kottaridi and Stengos (2010) confirmed that human capital has a nonlinear effect on economic growth even in the presence of FDI, which means that the changes of value in human capital does not correspond with the constant changes in economic growth. Baharumshah and Almasaied (2014), who

explore the role of FDI in economic growth in Malaysia, found that by cooperating FDI with human capital the result is a positive effect of growth in both the short and long term. It explains that the educational system allows the country to receive more from the positive spillover effect of FDI. Baharumshah and Almasaied (2014) also stated that the factors of Malaysia's remarkable economic growth records over the past three decades were partly due to the contributions of education and financial institutions.

In contrast, some studies based on developing countries failed to find supporting evidence. For example, Adewumi (2006) applying time-series analysis to annual data from 1970 to 2003 for selected Africa countries to examine the contribution of FDI to economic growth but failed to find any evidence statistically significant result. Herzer et al. (2008) examined 28 developing countries from Latin America, Asia and Africa, applied time series techniques from 1970-2003 but found weak evidence that FDI enhances either a long-run or short-run GDP. Hytenget's cross-country analysis (2014), found a lack of prior research with studies that integrate absorptive capacity on FDI and economic growth, which resulted in vagueness in the research. Absorptive capacity as being linked with a country's FDI/trade policy, human capital, R&D, and also the country's infrastructure quality.

Babalola et al. (2019) reported that trade openness boosts economic growth in a number of ways including technology transfer, bait for FDI, source of foreign exchange, and means of getting access to capital equipment to enhance development. In this thesis, trade (proxied by the sum of total import and export, and export of oil and gas) is also seen to influence the impact of oil and gas FDI on economic growth in Nigeria. These findings corroborate with Sothan (2015) who used panel cointegration for 21 Asian countries over the period from 1980 to 2013 to examine the co-movement of FDI and exports on economic growth. They found that there was a long-run relationship between FDI, exports, and GDP for the examined countries. Balasubramanyam et al. (1996) in a study of 46 developing countries with a cross-section data

found that FDI has positive spillover effects on economic growth, but the magnitude is affected by host country trade policy. FDI is expected to promote competitiveness in the host location, encourage more export and import, may also generate foreign exchange, in turn, will have a multiplier effect on GDP. Basu et al (2003) using a panel of 23 countries, found a co-integrated relationship between FDI and GDP growth. Moreover, thus, emphasised that trade openness is a crucial determinant of the impact of FDI on growth in open economies. Ewetan and Okodua (2013) after employing time-series data on Nigeria's foreign export and GDP growth from 1970-2010, the study VAR model did not support the Export-Led Growth hypothesis for Nigeria. Zhang (2001), has researched 11 countries in East Asia and Latin America and stated that the policy regimes that are open to both capital flow and foreign trade have led to an increase in the FDI in East Asia. Through this openness, foreign firms can reduce their liability in trade transactions. Thus, this will increase the number of FDI in the host country and will increase the growth of the economic performance of countries. As stated by Baharom et al. (2008), trade openness has influenced economic growth and it was proven to have a significant result. Whereby, trade openness was measured by dividing the total of import and export data with the GDP. Baharom et al. (2008) also proved a positive and significant relationship of trade openness on economic growth both short and long-run relationship. FDI leads to increased economic growth. Babalola et al. (2019) relying on panel data from 38 African countries over the period from 1960 to 2014, they revealed that the impact of FDI on economic growth in Africa is only significant in the agricultural sector and insignificant in the manufacturing sector with a negative sign. Omri et al. (2015) revealed that there is an interrelated relationship between both economic growth and trade openness, which is that the increase in trade openness will increase economic growth. Supported by Kyophilavong et al. (2015) who revealed that trade openness helps in increasing economic activity and leads to positive economic growth and that economic growth leads to trade openness.

In terms of institutional/political factors, the study found that institutional/political influence proxied by the rule of law, the empirical results show that both rule of law and corruption have a significant negative effect on Nigeria's economic growth. For example, Driffield and Jones (2013) found that FDI has a positive and significant impact on the growth when the institutions are taken into account. De Mello (1999) found that the effect of FDI on economic growth is stronger for host countries with a higher level of institutional capability measured by the degree of property rights protection and bureaucratic efficiency in the host country. Another measure for institutional quality is the level of political stability; political stability is usually measured by the probability of a change of government, as well as political violence as measured by the sum of the frequency of political assassinations, violent riots and politically motivated strikes (Ayanwale, 2007). It is widely acknowledged that when a country is politically unstable its economic growth is hindered (Ayanwale, 2007).

Bon (2019), providing evidence from Vietnam, examined the role of institutional quality in the relationship between FDI and economic growth and reported that good institutional quality has a significantly positive impact, but the bad institutional quality has a negative and insignificant effect on economic growth. Bon (2019) further added that good institutional quality could help foreign investors to lower transaction costs to improve competitiveness and profit. According to Anghel (2005), factors of institutional quality of a country relating to the level of corruption and protection of property rights, are significant in attracting FDI.

Busse and Hefeker (2007), after examining FDI inflows for 83 developing countries over the period 1984 to 2003, reported that the absence of internal conflict and ethnic tensions, government stability, fundamental democratic rights, law and order are highly significant determinants. Wernick et al. (2009), investigating the role of institutional quality in a sample of 64 emerging economies from 1996 to 2006, asserted that institutional quality has a significant positive impact on attracting FDI inflows. McCloud and Kumbhakar (2012)

suggested that controlling for institutional quality reduces the degree of heterogeneity in the FDI–growth nexus for panel data of 60 non-OECD countries over the period 1984–2002. Raheem and Oyinlola (2013) examined the role of governance level on the FDI–growth nexus for seven ECOWAS countries over the period from 1996 to 2010 and confirmed that FDI and governance have positive effects on economic growth in OLS estimation and with Threshold Autoregressive model. Kuzmina et al. (2014) in the case of Russia found higher pressure from regulatory agencies, criminals, higher frequency of illegal payments, and enforcement authorities, have significant adverse effects on attracting FDI inflows. Kuzmina et al. (2014) also reported that an increase in institutional quality from an average to the top across Russian regions shows that increase in FDI stock more than doubles. Ajide et al. (2014) using the data of 27 SSA economies with six distinct measures of governance between 2002 and 2010, indicated that control of corruption, political stability and government effectiveness have significant effects on the relationship between FDI and economic growth. Adeleke (2014), examining the effects of governance on the relationship between FDI and growth for a panel data of 31 African countries, suggested that African governments should enhance their governance structure. Nguyen (2015), using the estimation technique of difference GMM for a sample of 43 provinces from 2005 to 2012, found that institutional quality is a significantly positive determinant of FDI inflows in Vietnam.

The empirical findings revealed that infrastructure (proxied by mobile phone subscription) influence the impact of oil and gas FDI on economic growth in Nigeria. As a proxy for infrastructure, access to electricity was found to be insignificant. Wheeler and Mody (1992) argued that the quality of infrastructure reduces operating costs, facilitates production and thereby promotes FDI. Hence, good infrastructure should increase productivity which in turns promotes economic growth. Easterly and Rebelo (1993) revealed that public expenditure on communications infrastructures significantly raises growth. Fay and Perotti (1994) found a

positive effect of telephones on economic growth. Lopez (2004), found that infrastructure raises growth and reduces income inequality. Easterly (2001) reported that telephone density contributes significantly to explain the growth performance of developing countries.

The empirical results show that interest rates as a proxy for policy liberalisation has a negative effect on pooled country level, but insignificant results were found for OECD and non- OECD countries. Also, the influence of one of the known other factors on FDI flows was the financial crisis of 2008; a dummy variable was introduced for this time period. From the regression results, the 2008 financial crisis had a negative relationship with FDI inflows; this suggests that inflows from both OECD and non-OECD countries in Nigeria's OGFDI were deterred during the financial crisis. The negative effect on the pooled country level compared to the OECD and non-OECD countries corroborate the work of Vojtovič et al. (2019), after investigating the linkage among FDI and economic growth in 11 countries from Central and Eastern Europe (CEE) from 1997 to 2014, revealed that FDI has an impact on economic growth and that this effect is further strengthened by financial market development. Vojtovič et al. (2019) findings are consistent with prior studies that suggest that more developed financial markets are better able to absorb capital inflows effectively. For instance, Edison et al. (2002) and Padhan (2007) revealed that due to increased savings and efficient capital allocation enabled by a well-developed stock market positively influence economic growth. Bordo and Meissner (2006) showed that host locations with efficient financial systems have less susceptibility to financial crisis and experience faster economic growth.

Authors argue that developed financial system provides an effective mechanism for efficient resource allocation, better monitoring of investment projects, fewer information asymmetries and economic growth (Sghaier and Abida, 2013; Vojtovič et al., 2019). However, some studies have further revealed that the level of financial development and economic growth is related

to the country's level of absorptive capacity and infrastructure development (Sghaier and Abida, 2013; Vojtovič et al., 2019). Nguyen et al. (2009) showed that financial development plays an essential role as an absorptive capacity factor, even though financial development can cause positive effects, as a part of the absorptive capacity, the impact of financial developments towards. Almfraji and Almsafir (2014) identified that suitable levels of financial development, alongside human capital and open trade regimes, can promote a positive effect on the relationship between FDI and economic growth. Hermes and Lensink (2003) also mentioned that a financial system can boost the FDI inflow as it provides a more developed system that contributes to technological diffusion. Therefore, financial development is known as the influencing relationship factor between FDI and economic growth. Jayaraman et al. (2017) examined the existence of a long-term relationship between FDI and economic growth with the presence of financial sector development and have resolved the answer, where the FDI and financial sector development was confirmed to contribute to the growth of the economy, and financial sector development is complementary to FDI.

8.7 Chapter Summary

This chapter has empirically shown that the impact of inward oil and gas FDI is beneficial to the economic growth of Nigeria and that the magnitude between OECD and non-OECD countries differs. This study analysed the impact of oil and gas FDI in Nigeria empirically. Also, the empirical analysis examined the impact of oil and gas FDI from OECD and non-OECD countries into Nigeria. This analysis provide empirical evidence on the impact of oil and gas FDI in Nigeria and that from OECD and non-OECD countries. The empirical study results support the hypothesis that inward oil and gas FDI has a significant positive effect on economic growth.

9.0 Chapter Nine: Analysis and Discussion on the Impact of Oil and Gas FDI on Nigeria's Export

9.1 Introduction

As discussed in Section 1.2, on the rationale of the study/research gap and also, in Chapter 5 which provides the literature review on the theories of FDI and trade, and the conceptual framework and hypothesis development about the impact of oil and gas FDI in Nigeria, this current chapter aims to carry out an empirical analysis of the impact of oil and gas FDI on export in Nigeria. Also, the empirical analysis will examine the impact of oil and gas FDI from OECD and non-OECD countries on export in Nigeria. The chapter is structured into six main sections as follows: after the introduction, the next section explains the study model and sample observations. The third section discusses the dependent variable used in this chapter. The fourth section discusses the independent variables for both predictive and control variables. The fifth section discusses the empirical results synthesised with the relevant empirical literature. The sixth section discusses the results.

9.2 Sample and Study Model

The study model is developed to analyse the impact of oil and gas FDI on export performance in Nigeria. Variables in the model are in line with the study analytical framework developed from reviewed empirical literature on FDI-export nexus in Nigeria and other developing countries. Specifically, the model will capture the effects of oil and gas FDI impact on export performance, and how other indicators affect the relationship. These include; human capital, trade openness, infrastructure, and Institutional/Political factors. All the variables used in the above model are expressed in ratios with the numerator data for the host countries divided by the denominator represents data for home countries.

$$\text{Export}_{it} = \alpha + \beta_1 \text{FDI}_{it} + \beta_2 \text{Human capital}_{it} + \beta_3 \text{Trade openness}_{it} + \beta_4 \text{Infrastructure}_{it} + \beta_5 \text{Institutional/political factors}_{it} + \beta_6 \text{Exchange rate}_{it} + \beta_7 \text{Financial Crisis} + \varepsilon_{it} \dots\dots\dots(i)$$

ε_{it} represents the error term.

9.3 Dependent Variable

Many empirical studies particularly in the case of Nigeria for example, Enimola (2011), Olayiwola and Okodua, (2013), Aigheyisi (2015) and Babatunde (2017) examined general FDI to industry-specific export performance, measured by total export and exports in manufacturing, non-oil sector, agricultural sector oil and services sectors. In order to build on existing studies, and fill the gap in the literature, this study will measure Nigeria's export performance using two indicators, which include, aggregate export, and export in oil and gas. Using these indicators will provide empirical evidence on the role of oil and gas FDI in promoting export in Nigeria and the oil and gas sector.

This approach has been used by Gawad and Muramalla (2013) in a study examining the impact of FDI on oil, gas and refinery production and their exports. The dependent variable for this study will be obtained from Nigeria Bureau of Statistics and Central Bank of Nigeria.

9.4 Independent Variables

In line with the study hypothesis (as stated in Section 5:5), the first predictive variable is oil and gas FDI (proxied by FDI capital expenditures by foreign MNEs in Nigeria oil and gas industry). For instance, Zhang (2005) indicated that FDI had positive and significant impact on the exports of China. Jongwanich (2010) with the data of eight Asian countries over the years 1993-2008, found that inward FDI is positively related to the export performance. Jevcak et al (2010) analysed FDI inflows in 10 new EU member countries (EU enlargement from 2004)

and revealed that FDI in the mentioned countries does not have higher contribution to productivity growth and export potential. A study by Zakia and Ziad (2007) examined the relationship between FDI and the economic expansion of Jordan, their results showed that there is a significant relationship between FDI and productivity along with imports and output. Selimi et al. (2016) examined and analysed empirically the foreign direct investment and export performance during the period of 1996-2013 in Western Balkan countries. They revealed that FDI positively affect export performance. However, authors have also argued that FDI-export nexus depends on the interactions with other macroeconomic indicators (Buckley et al., 2002). For instance, Buckley et al., (2002) argue that the extent to which FDI contributes to growth depends on the economic and social conditions in the recipient country. They found that countries with open trade system and infrastructure would benefit more from the increase of FDI to their economies. Freund *et al.* (2004) found that the internet stimulates trade. They revealed that a 10-percentage point increase in the growth of web hosts in a country leads to an approximately 0.2 percentage point increase in export growth. The idea here is that the infrastructure condition plays a positive role in promoting exports (Freund *et al.*, 2004; Hailu, 2010). Another variable is the exchange rate. Prior empirical studies proposed negative results between exchange rate and exports (Hayakawa and Kimura, 2009; Haile and Pugh, 2013.). For example, Hayakawa and Kimura (2009) found that the exchange rate discourages intermediate goods trade in international production networks intra-East Asian trade. Nishimura and Hirayama (2013) found that Japan's exports to China were not affected by exchange rate volatility, but that China's exports to Japan were negatively affected during the reform period. Similarly, IB scholars also proposed that political instability or weak institutions would discourage FDI. For instance, Wafure and Nurudeen (2010) in his own studies on the determinants of FDI in Nigeria revealed that market size, deregulation, political instability and exchange rate depreciation are the main determinants on FDI in Nigeria. Strong courts and

adherence to the rule of law also contribute to political stability, a matter of serious concern for both foreign and domestic investors. Authors such as Henisz (2000), Jensen (2008), Li and Resnick (2003), and Li (2009) provide empirical evidence suggesting that strong courts, rule of law, and checks on the executive are the mechanism limiting political risk, which encourages FDI. This study, the main predictive variable is modelled to capture the effects of oil and gas FDI impact on export performance, and also examined are other indicators that would affect the relationship these include; human capital, trade openness, infrastructure, exchange rate and institutional/political factors (see Table 17 below). Extending this line of research, this study will further consider the heterogeneity of investing MNEs grouped into OECD vs non-OECD countries based on their economic and technological capability in examining the estimated coefficients.

Insert Table 17 here

9.5 Empirical Analysis and Key Findings

Insert Tables 18, 19 and 20 here

Before empirically proffering solutions to the research questions, the study conducted several pre- and post-estimation tests with a view to providing valid and reliable results. The pre-estimation tests include normality, multicollinearity and heteroskedasticity tests. In terms of normality, Appendix 1 presents the descriptive statistics, showing the key features of the study dataset (in relative terms) before log transformation and Appendix 2 shows the key features after log transformation. Based on the pooled dataset, the average of FDI was 1257, with a maximum of 20562 and standard deviation of 36.27. Similar patterns were also observed for other variables (such as; GDP, labour force, fuel export, trade, rule of law, mobile subscription, interest rate, and technology). As shown in Appendix 1, it is observed that the dataset has unequal variation with a large mean and large standard deviations. In order to conform the dataset to normality, a log10 transformation became necessary to equalise the variation

squeezing the groups with the larger standard deviations, and stretching data with the smaller values and standard deviations as exhibited in Appendix 2 (Saunders & Thornhill, 2012). This was done for all the study variables with a prefix “In” with each variable.

For the multicollinearity test in Tables 18 and 19, shows that there is no multicollinearity problem. For the multicollinearity test, both the collinearity table matrix and VIF test was conducted. Multicollinearity exists if the study variables are highly correlated usually above 80% or 90% of the correlation matrix or the VIF value should not be above 10 or tolerance values not less than 0.10. Table 20 shows the empirical results of the study country-level analyses for aggregated country-level, OECD and non-OECD countries groups.

As shown in Table 20 inward oil and gas FDI in Nigeria has a significant positive effect on export performance in Nigeria (for both national exports, and oil and gas exports), the results shows significance level for country-level at 5% level (with coefficient 0.0987), OECD at 5% level (with coefficient 1.8095) and non-OECD countries at 10% (with coefficient 2.6649). This provides statistical support for H₉, H_{9a} and H_{9b}.

Human capital proxied by labour force shows that labour force influences the impact of oil and gas FDI on export performance in Nigeria for all the study observations as shown in Table 20. The result shows the significance level for country-level at 1% level (with coefficient 0.2243), OECD at 1% level (with coefficient 0.1839) and non-OECD countries at 1% (with coefficient 0.0937). This provides statistical support for H₁₀. Trade openness proxied by sum of total import and export shows that trade openness has significant positive impact on export performance in Nigeria at the aggregate country-level, OECD and non-OECD countries groups. The result shows the significance level for country-level at 1% level (with coefficient 0.1624), OECD at 1% level (with coefficient 1.7458) and non-OECD countries at 1% (with coefficient 2.5375). This provides statistical support for H₁₁. Infrastructure proxied by mobile phone subscription shows that mobile phones subscriptions have significant positive effect on

export performance in Nigeria at the aggregate country-level at 10% level (with coefficient 0.1414), OECD group at 5% level (with coefficient 0.0668), and non-OECD countries groups at 10% level (with coefficient 0.0595). This thus provides statistical support for H12. Political/institutional influence was proxied by the rule of law, the empirical results show that rule of law has an insignificant negative effect on export performance in Nigeria at the aggregate country-level, OECD and non-OECD countries groups. This thus provides statistical support for H13. The study results also reveal that exchange rate has negative significant impact on Nigeria foreign export (for both Nigeria as a whole and OECD countries at 5% level, while for non-OECD countries at 10% level). This thus provides statistical support for H14.

The *Wald* diagnostic test indicates that the models have sufficient explanatory power to explain the changes in oil and gas FDI and the results of the first-order and second-order serial correlation (AR1 and AR2) indicate that the error term from the models does not exhibit second-order serial correlation (Cameron and Trivedi 2010) while the results of the Sargan test confirmed that there is no problem with the validity of instruments used.

9.6 Discussion of Findings

This study empirical results show that OGFDI has a significant positive effect on Nigeria's export performance. However, OGFDI from non-OECD countries have higher positive effect on Nigeria's export performance than OECD countries OGFDI in Nigeria (due to the size of the estimated coefficient in Table 20). These findings corroborate with studies that revealed that export oriented FDI promotes host country's export performance. Kneller and Pisu (2007) argued that MNC, especially those who are export-oriented appear to instigate positive export spillovers and may increase the probability of exporting for local firms operating in the same industry. Kokko et al. (2001) found that domestic firms are more likely to export if they operate in sectors where foreign firm's presence are relatively high. In another related study, Greenaway et al. (2004) found positive spillover effects on U.K owned firms as well as on their

export propensity. Likewise, Kneller and Pisu (2007) indicated that the decision to export is positively associated with the presence of foreign firms in the same industry and region and export-oriented foreign affiliates generate stronger export spillovers.

Regarding the findings that OGFDI from non-OECD countries have higher positive effect on Nigeria's export performance than OECD countries OGFDI in Nigeria, this findings contradicts extant studies, for example, Bykova and Lopez-Iturriaga (2018) provided empirical evidence in support of a positive impact of foreign ownership from developed countries on exporting performance of local companies through transferring advanced technologies. Boddin et al. (2017) reported that foreign ownership has a significant positive effect on the propensity of firms to engage in international trade. These authors argued that the lack of foreign presence, would, in turn, lead to inferior knowledge of foreign markets by local firms, hence, reduce access to a broader array of financial opportunities to fund investments and innovations. Wignaraja (2012) reported that the relationship between domestic technological activity in Sri Lanka and FDI from developed countries are complements, rather than substitutes. In contrast, Suyanto and Salim (2013) reported that local Indonesian pharmaceutical firms' technical efficiency is decreased due to inward FDI. Popovici and Cantemir (2017) examined the impact of FDI on both EU countries' exports and imports. The main result indicates a complementary relationship between FDI and both exports and imports. Camarero and Tamarit (2004), based on 13 OECD countries comprising of 11 from the EU, US and Japan, reported that FDI positively influences exports for whole sample of countries. Wang et al. (2007) conducted an empirical investigation to ascertain what types of firms are more favoured between foreign or domestic firms regarding their exports. The study results pointed to a significant impact of FDI on the whole exports both foreign and domestic companies. The empirical results also showed that there was no substantial difference as regards the country of origin. Kutan and Vuksic (2007) examined a sample of 8 new EU countries and 4 Southeast European countries, and the

results indicated that the presence of MNEs increased exports of the sample countries. Vuksic (2006) examined 14 CEE countries, both EU and non-EU, from 1993 to 2001 investigating the factors contributing to export performance and revealed that FDI impact on exports has a higher magnitude in EU countries than in the rest of the sample. Prasanna (2010) examined the effect of FDI on total manufacturing exports and the high-tech manufactured exports for India during the period from 1991 to 2007. The study reported FDI is positive and significant in both equations; however, a higher magnitude was reported for high-tech exports. Vural and Zortuk (2011) using the technique of simultaneous equations to investigate the impact of FDI on the export performance and the study covers a period of 27 years, from 1982 to 2009. The study reported a positive and significant effect of FDI on the export performance. Sharma and Kaur (2013) using the Granger causality test to examine the relationship between FDI and imports in China and India. In the case of China, Sharma and Kaur (2013) reported that FDI contributes to increasing imports and further improving exports. However, in the case of India, the study revealed that there is a bidirectional relationship between FDI and imports.

Elsewhere, Kugler (2006) investigated the effect of FDI on the exports of Venezuelan manufacturing firms using panel data analysis covering the period from 1995 to 2001. The study found that the extent to which FDI stimulates export is dependent on multinational corporation's demand for domestic input. Heliso (2014) investigated the impact of inward FDI on disaggregated export of member countries of COMESA in the period from 1993 to 2012. The empirical result showed a positive, significant relationship between FDI and export in agriculture, manufacturing and natural resource, and the impact is larger on manufacturing exports. Studies in China indicated that increased levels of FDI positively affect Chinese manufacturing export performance (Sun 2001; Zhang and Song 2001; Zhang 2005). These authors attributed the results to the fact that FDI in China has largely been export-oriented due to manufacture industry. Athukorala and Menon (1995) studied the role of export-oriented FDI

in Malaysia's manufactured exports. Export-oriented FDI has brought a significant return to Malaysia because of favourable economic climate for internationalisation of production. In the case of oil and gas sector, Gawad and Muramalla (2013) conducting a simple regression model for seventeen countries, revealed that there is a positive and significant relationship between FDI and Exports of Oil and Gas Industries. Bournakis and Tsoukis (2016), providing empirical evidence based on OECD countries, revealed a non-linear effect of government size and institutional features on export performance. The study also revealed that labour market rigidity has a negative effect on export portions. Moroz et al. (2017) examined the impact of FDI on the foreign export of goods per capita of regions of Ukraine. Based on the empirical study findings, the model confirms that FDI has a positive impact on export trade activities at a regional level of the country.

The empirical findings also revealed that human capital (proxied by labour force) influence the impact of oil and gas FDI on export performance in Nigeria. Location with cheap labour force or with highly skilled labour force will promote domestic production, which in turn attracts export-oriented MNEs. The transfer of new assets by foreign affiliates through training, skills development and knowledge diffusion opens up prospects for further dissemination to other enterprises and the economy at large which in turn promote export. Labour factor has a direct effect on production efficiency and costs. In the FDI literature, studies have shown that high labour costs discouraged FDI inflows (Noorbakhsh et al., 2001), while high labour productivity encourages FDI inflows (Al-Sadig, 2009). Education remains an essential aspect of human capital development. An increase in the supply of educated people, as well as the quality of their education, can improve locational advantages (Noorbakhsh et al., 2001). Education results in a labour force that is literate, numerate and skilled in the use of modern production facilities and techniques (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007).

According to Lucas (1990) lack of human capital discouraged foreign investment in less-developed countries. Zhang and Markusen (1999) put forward a model where the availability of skilled labour in the host country is a direct requirement of MNEs and affects the volume of FDI commitment. Cipollina et al. (2016), using a gravity model to estimate how the exporter's ability to innovate and meet quality standards influences the overall quality of exports, revealed that the overall quality of exports depends on the technological state of the industrial sector and the economic situation of the exporting country. Villena-Manzanares and Souto-Pérez (2016) considered whether corporate image, sustainability, and innovative orientation influence the export performance of manufacturing SMEs in Spain. Applying the technique Partial Least Squares, the researchers find out that the factors are positively associated with export activities of companies. Correa-López and Doménech (2012) indicated that many individual investment decisions and actions at companies' level influenced Spanish firms export performance. Those factors relate to improvements of physical and human capital, innovations, reliance on long term financing and presence of foreign ownership.

Srholec (2007) reported that the gross enrolments in tertiary education, technological capabilities of a country, the amount of computer access, the number of patents and the size of the economy have positive effects on high technology exports. Braunerhjelm and Thulin (2008) based on selected OECD countries, revealed that R&D investments are a key factor in determining high-tech exports. In a more recent study, Göçer (2013) using data from 1996 to 2012 in a study of 11 emerging Asian countries, examined the impact of R&D expenditure on high-tech products effect and high-tech exports, the study revealed that R&D expenditure has a positive impact on both high-tech products and high-tech product exports. Ismail (2013), based on 10 Asian countries, examined the impact of innovation work on high tech exports and revealed that innovation activities increased high-tech product exports. Based on G8 countries from 1996 to 2011, Kılıç et al. (2014) investigated the impact of R&D expenditure and real

exchange rates on high-tech exports. The study reported a significant positive effect. Kabaklarli et al. (2017) using a panel data approach for selected OECD countries, the study found positive significant effect of FDI on high-technology exports of 14 OECD countries (Canada, Denmark, Finland, France, Germany, Israel, Korea, Netherland, Norway, Switzerland, Sweden, Turkey, UK, USA).

Trade openness proxied by the sum of total import and export shows that trade openness and exports in oil and gas have significant positive impact on export performance in Nigeria at the aggregate country-level, OECD and non-OECD countries groups. The degree of openness of an economy to international trade and investments the more FDI it attracts (Mina, 2007). IB scholars argued that the degree of trade openness is likely to influence the flows of international capital. The idea is that foreign investors are not interested in committing long-term investment in a country that imposes tariff and non-tariff barriers on investment and creates problem in repatriating capitals as well as profits (Adhikary, 2011). The level of trade openness also indicates the degree of comparative advantage of a country in undertaking investment and produce for export. This relates to ‘transaction cost theory’ that postulates a low transaction cost environment generates financial incentives (higher return on investment) for both the domestic and foreign players in supplying large irreversible investment like FDI (Coase 1937, Williamson 1975). Edwards (1992) also noted that countries with a higher degree of economic openness could grow faster by absorbing new technologies at a faster rate than a country with a lower degree of openness. Esteves and Rua (2015) evaluated the role of domestic demand pressure regarding exports activities in Portugal, stating that this variable is relevant for the short-run dynamics of exports of this country.

Infrastructure proxied by mobile phone subscription showed that only mobile phones subscriptions have a significant positive effect on export performance in Nigeria at the aggregate country-level, OECD and non-OECD countries groups. Infrastructure relates to

physical and non-physical systems provide by public institutions to facilitate business operation and society. The quality of host location infrastructure could influence FDI inflows (Asiedu, 2006). Ang (2008) argued that the provision of infrastructural support could raise the productivity of capital and expand the overall resource availability by increasing output. Asiedu (2006) found that countries with excellent infrastructure attract FDI in SSA. Udoh and Egwaikhide (2008) in their study of FDI in Nigeria between 1970 and 2005 found that infrastructural developments (appropriation size of government spending) are crucial determinants of FDI inflows into the Nigerian economy. Wagner (2016) investigated how the quality of firms' exports and the distance to destination countries for Germany are connected. The researcher found a positive correlation between the quality of exported goods and this distance.

Political/institutional influence proxied by the rule of law, the empirical results showed that both rules of law and corruption have a significant negative effect on export performance in Nigeria at the aggregate country-level, OECD and non-OECD countries groups. Political instability or frequent occurrences of political disorder can result in an unfavourable business climate which seriously erodes risk-averse foreign investors' confidence in the local investment climate and thereby repels FDI. Araujo et al. (2016) explored the impact of contract enforcement and export experience, confirmed that there is a positive influence on the export activities of companies in this respect. The study further showed that the export growth of companies is negatively associated with the quality of the country's institutions, Pekovic and Rolland (2016) analysed the link between quality standards and export activities concerning the following selected indicators: the logarithm of exports per employee, the logarithm of exports per employee destined for EU countries, the logarithm of exports per employee destined for non-EU countries, and the export share in total sales. It is revealed that there is a positive and statistically significant relationship among the indicators. Vdovychenko and

Zubritskiy (2016) analysed the influence of discretionary fiscal policy on Ukraine's export trade. They found that fiscal consolidation has a positive effect on this trade with a lag of 2-3 years. Asiedu (2002) in a study on determinants of FDI flows to SSA, concluded that FDI in Africa is not solely determined by availability of natural resources but also that, institutional factors play an essential role in directing FDI through macroeconomic and political stability and efficient institutions. Asiedu (2006) found that an efficient legal system, less corruption and political stability promote inward FDI to SSA countries. In another related study, Cleeve (2004) examined the effectiveness of fiscal incentive to attracting FDI to SSA countries using multiple regression analysis. In the case of Nigeria, Salisu (2003) analysed the impact of corruption on FDI in Nigeria and found that corruption had a significant detrimental effect on FDI. Söderlund and Tingvall (2014) explored the effects of institutions on firms' export activities. They identified that, in the case of weak institutions in recipient countries, export operations have a relatively short period and small volume. At the same time, this dependence on institutional quality decreases gradually over time.

The study results also revealed that the indicators for exchange rate and financial crisis had a negative impact on Nigeria foreign export (for both Nigeria as a whole, OECD and the non-OECD countries). This draws support from Fapetu and Oloyede (2014) using OLS estimation techniques with error correction model framework to examine exchange rate and Nigerian economic growth from 1970 to 2012, found that the exchange rate was not statistically significant. Adeniran et al. (2014), using ordinary least square (OLS) method to analyse the impact of exchange rate on economic growth in Nigeria from 1986 to 2013, showed that the exchange rate had no significant effect on Nigeria economic growth. In another related study, Oyinbo et al. (2014) using time series data for a period of 26 years, from 1986 to 2011, examined the causal relationship between exchange rate and the agricultural share of the GDP in Nigeria. The study revealed a unidirectional causality from exchange rate to agricultural

share of GDP. Stephen (2017) examined the impact of the exchange rate on export performance in Nigeria for the period 1970s-2014. The empirical study fails to find neither short-run nor long-run equilibrium relationship in the nexus between exchange rate and Nigeria foreign export. However, the research showed that there is a unidirectional causality running from the exchange rate and Nigeria international export with no feedback. These findings corroborate with scholarly views that in a single commodity, particularly a crude oil-dependent economy such as the case for Nigeria, the exchange rate may have very little impact on foreign export. This is inconsistent with existing FDI theory which proposed that the devaluation of the host location currency would spur local export.

9.7 Chapter Summary

This chapter has empirically revealed that the impact of inward oil and gas FDI is beneficial to the export performance of Nigeria and that the magnitude between OECD and non-OECD countries differs. The results indicate that inward oil and gas FDI in Nigeria has a significant positive effect on export performance in Nigeria (for both national exports, and oil and gas exports). Also, the empirical analysis examined the impact of oil and gas FDI from OECD and non-OECD countries into Nigeria. This analysis provides empirical evidence on the impact of oil and gas FDI in Nigeria and that from OECD and non-OECD countries.

10. Chapter Ten: Conclusions and Implications

10.1. Introduction

This last chapter concludes and summarises the findings of this study as well as outlining the policy contributions to knowledge and practice. The recommendations in this chapter are beneficial to future research in determinants and impact of oil and gas FDI into a developing country, in this case, Nigeria, and, by home countries grouped into OECD and non-OECD countries. The sections of this chapter are structured as follows: Section 10.2 outlines the research conclusion and summary. Section 10.3 discusses the research contribution to knowledge and practice. Section 10.40 discusses the limitations of the study and provides recommendations for future research. Section 10.5 provides the study final summary.

10.2 Research Conclusions

This research study was developed to explore the determinants of FDI in Nigeria's oil and gas industry by providing a comprehensive empirical analysis to fill the existing literature gap. The empirical analysis was based on three sample estimates of FDI from Country level, OECD and non-OECD home countries. The panel dataset was employed to identify the determinants of FDI flows into Nigeria's oil and gas industry. The main theoretical and empirical contribution is to find out what influences and impacts FDI in Nigeria and that such influence and impact on FDI inflows are continually changing over time in line with the characteristics of both home and host countries. Furthermore, the empirical findings suggest that Market seeking, Resource seeking, and Efficiency seeking are key determinants of FDI flows into Nigeria.

10.2.1 Conclusion on the Determinants of Oil and Gas FDI

The first empirical chapter examined the determinants of oil and gas FDI in Nigeria and that from OECD and non-OECD home countries. The study found that oil and gas FDI in Nigeria

is positively influenced by market-seeking (proxied by GDP per capita) for all the study observations, including Nigeria as a whole, OECD and non-OECD home countries. These empirical results corroborate with prior studies such as Chakrabarti (2001), Vial (2002), Frenkel et al. (2004), Carstensen and Toubal (2004), Nunes and Oscategui (2006), Moosa and Cardak (2006), Ang (2008). These authors argued that the size of the domestic market could attract more FDI inflows due to the benefits of the economies of scale and to exploit potential economic prospect. In another related study, Jordaan (2004), who argued that market-seeking FDI is attracted to expanding markets (with higher purchasing power), where firms can potentially receive a higher return on their capital and by implication receive higher profit from their investments. For example, Nunes and Oscategui (2006) examined 15 Latin American countries found a positive relationship between market size (measured by GDP) and FDI.

The study also found that oil and gas FDI in Nigeria is positively influenced by natural resource-seeking (proxied by fuel export) for all the study observations including country-level, OECD and non-OECD countries. These empirical results corroborate with prior studies such as Morisset (2000), Asiedu (2002), Mohamed and Sidiropoulos (2010) and Pan (2016). Countries like Angola, Botswana, Namibia and Nigeria have received foreign investment targeted at the oil and minerals sectors, for example, Asiedu (2006), using a panel data for 22 countries in SSA over the period 1984–2000. Asiedu (2006) reported that countries that are endowed with natural resources attract more FDI. Dauda and Stein (2007) empirical investigation on factors attracting FDI to Nigeria between 1970 and 2006, reported that endowments of natural resources are significant determinants of FDI in Nigeria. Mohamed and Sidiropoulos (2010), using a panel of 12 MENA countries, concluded that the key determinants of FDI inflows in MENA countries are the natural resources, the size of the host economy, and institutional variables. Hailu (2010) concluded that natural resources, labour quality, trade openness, market accession and infrastructure condition positively and significantly affect FDI

inflows. The main aim of resource-seeking as a motivation to FDI is to obtain certain types of resources from host countries that are unavailable in the home countries of firms such as raw materials and natural resources. Resource seeking motivations occur as a result of the availability of natural resources at a relatively lower cost in host countries compared to home countries.

Natural resource seeking FDI is dependent on the fact that such resources desired for are location specific. Dunning (1993) emphasised the need to guarantee a cheaper and safer supply of natural resources to justify much of the FDI inflows in the 1800s and the nearly 1900's mostly to less developed areas of the globe from the most industrialised nations which are Europe, USA and Japan. Availability of natural resources essentially attracts foreign investors from two key emerging economies of the world (China and India) (UNCTAD, 2011). In Africa, countries with abundant natural resources are prominent recipients of FDI (UNCTAD-WIR, 1995), advantages of location champion such as FDI inflows because these resources influence the location of firms to Africa. Top recipients of FDI inflows from China are countries endowed with natural resources such as Algeria, Sudan, Democratic Republic of Congo, Niger, Nigeria, Zambia and South Africa (Brown, 2012).

The study also found that oil and gas FDI in Nigeria is positively influenced by efficiency-seeking (proxied by Labour Force) for all the study observations including Nigeria as a whole, OECD and non-OECD home countries. These study findings are consistent with previous studies that showed that MNEs take advantage of differences in factor costs among locations (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007; Sadig, 2009; Vijayakumar et al., 2010). Here, FDI by MNEs from higher-cost regions into low-cost regions in order to reduce production costs and gain efficiency. For example, Dasgupta et al. (1996) examining Japanese FDI in China, India, Indonesia, Malaysia, Philippines, Thailand and Vietnam, revealed that Japanese MNEs are more interested in low wage labour in their FDI in Asia. Hanson (1996)

sample of 105 developing countries, noted that political stability and the security of property rights are more important determinants of FDI stock than human capital. Root and Ahmed (1979) found that human capital and skilled labour are not a significant determinant of FDI inflows for 58 developing countries examined in their study. Narula (2002) investigates the determinants of the stock of inward investment in pooled regressions of 22 developing countries, and the study revealed that human skills are positive but insignificant FDI determinants. Narula (2002) contrasted the results with those obtained for 18 industrialised countries, where technological capability and human skills are found to be highly significant and correctly signed. Narula (2002) argued that the inward investment into industrialised countries is increasingly aimed at seeking complementary created assets, unlike developing countries. Al-Sadig (2009) and Noorbakhsh et al. (2001) used secondary school enrolment and literacy rate as proxies of human capital, and both studies showed a positive effect on FDI. Gemmell (1996) argued that secondary school enrolment is not the best measurement of human capital because it does not measure the stock of human capital but rather the flow of human capital. Efficiency-seeking FDI exploits the existing competitive advantages of the firm in a short-to-medium term but does not essentially transform its core competence in enhancing long-term competitiveness. Efficiency-seeking investments engaged in by firms intend to increase efficiency through the exploitation of economies of scope and scale, as well as common ownership. Dunning (1993) suggested that efficiency-seeking FDI usually comes in effect after either market or resource seeking FDI are realized thereby increasing the profitability of the firms. Scholars have argued that an efficiency-seeking FDI occurs as a result of investors that seek locations with a lower cost for its operations especially with regards to labour as low labour costs attract more investment in host countries.

10.2.3 Conclusion on the Impact of Oil and Gas FDI on Economic Growth

Following the second empirical chapter on FDI and economic growth nexus, Chapter 8 provides empirical results in support of the hypothesis that inward oil and gas FDI has significant positive effect on economic growth. The result is in line with the findings of Ayanwale (2007), Roman et al. (2012), Koojaroenprasit (2012); Melnyk et al. (2014); Otto et al. (2014); Muntah et al. (2015) who all found that FDI has a positive effect on economic growth. However, the finding of this study is contrary to that of Aitken et al. (1999) and Jyun-Yi et al. (2008), they both documented a negative effect of FDI on economic growth. Similarly, Titarenko (2006) and Khaliq et al. (2012) reported that the effect of FDI on economic growth depends on the sector of interest. While some sectors show a positive effect, others show a robust negative effect (John, 2016). These findings corroborate with the body of literature that has documented positive effects of FDI on economic growth (Amna et al., 2010; Benmamoun and Lehnert, 2013; Manelle and Mohamed, 2012). In the case of evidence from Nigeria, Ogiogio (1995) empirical results documented negative contributions of FDI to GDP growth in Nigeria.

Ayanwale and Bamire (2001) examined the influence of FDI on firm-level productivity in Nigeria. The study reported a positive spillover of FDI on domestic firm's productivity. Openness to trade and available human capital is, however, not FDI inducing but FDI was found to contribute to economic growth in Nigeria. This study contrasted with extant empirical study in the case of Nigeria that has documented negative or no significant effect of FDI on economic growth. For example, Ariyo (1998) studied the investment trend and its impact on Nigeria's economic growth and found that only private domestic investment consistently contributed to raising GDP growth rates during the period considered (1970–1995). Akinlo (2004) In a study on the impact of FDI on economic growth in Nigeria, for the period from 1970 to 2001, the results showed that both private capital and including lagged foreign capital

have little or no statistically significant effect on the economic growth. The results seem to support the argument that extractive FDI might not be growth-enhancing as much as manufacturing FDI. Ayadi (2009) investigated the relationship between FDI and economic growth in Nigeria (1980 – 2007) and reported a very weak correlation and causality between the variables and recommends that infrastructural development, human capital building and strategic policies towards attracting FDI should be intensified.

10.2.4 Conclusion on the Impact of Oil and Gas FDI on Export Performance

Following the third empirical chapter on FDI and trade growth nexus, Chapter 9 provides empirical results in support of the hypothesis that inward oil and gas FDI has significant positive effect on Nigeria's foreign export. The result is in line with studies that revealed that export-oriented FDI promotes host country's export performance. For example, Kneller and Pisu (2007) opined that MNC especially those who are export-oriented appear to instigate positive export spillovers and may increase the probability of exporting for local firms operating in the same industry. Kokko et al. (2001) found that domestic firms are more likely to export if they operate in sectors where foreign firm's presence is relatively high. Greenaway et al. (2004), using data on a large panel of firms in the U.K to identify the possible transmission mechanism for export spillovers and its effects on the export decision of domestic firms, found positive spillover effects on U.K owned firms as well as on their export propensity. Kneller and Pisu (2007) indicated that the decision to export is positively associated with the presence of foreign firms in the same industry and region and export-oriented foreign affiliates generate stronger export spillovers.

In the case of Nigeria, revealed a positive and significant impact of inward FDI on total export and exports in manufacturing, oil and services sectors. Elsewhere, Kugler (2006) investigated the effect of foreign investment on the exports of Venezuelan manufacturing firms using panel data analysis covering the period from 1995 to 2001. The study found that the extent to which

FDI stimulates export is dependent on MNCs demand for domestic input. Heliso (2014) investigates the impact of inward FDI on disaggregated export of member countries of COMESA in the period from 1993 to 2012. The empirical result showed a positive, significant relationship between FDI and export in agriculture, manufacturing and natural resource, and the impact is larger on manufacturing exports. Studies in China indicate that increased levels of FDI positively affect Chinese manufacturing export performance (Sun 2001; Zhang and Song 2001; Zhang 2005). These authors attributed the results to the fact that FDI in China has largely been export-oriented due to manufacturing industry. Athukorala and Menon (1995) studied the role of export-oriented FDI in Malaysia's manufactured exports. Export-oriented FDI has brought a significant return to Malaysia because of favourable economic climate for internationalisation of production. Also, the empirical findings revealed that human capital (proxied by labour force) influence the impact of oil and gas FDI on export performance in Nigeria. Location with cheap labour force or with highly skilled labour force will promote domestic production which in turn attracts export-oriented MNEs. The transfer of new assets by foreign affiliates through training, skills development and knowledge diffusion opens up prospects for further dissemination to other enterprises and the economy at large which in turn promote export. Labour factor has a direct effect on production efficiency and costs. In the FDI literature, studies have shown that high labour cost discouraged FDI Inflows (Noorbakhsh et al., 2001), while high labour productivity encourages FDI inflows (Al-Sadig, 2009).

Education remains an important aspect of human capital development. An increase in the supply of educated people, as well as the quality of their education, can improve locational advantages (Noorbakhsh et al., 2001). Education results in a labour force that is literate, numerate and skilled in the use of modern production facilities and techniques (Meier, 1995; Noorbakhsh et al., 2001; Mina, 2007). According to Lucas (1990) lack of human capital discouraged foreign investment in less-developed countries. Zhang and Markusen (1999) put

forward a model where the availability of skilled labour in the host country is a direct requirement of MNEs and affects the volume of FDI commitment. In the case of Nigeria, Salisu (2003) analysed the impact of corruption on FDI in Nigeria and found that corruption has a significant detrimental effect on FDI. The official exchange rates proxied for political stability results suggest that exchange rates are insignificant with a negative sign for the country level, OECD and non- OECD countries. This indicates that the higher or lower the ratio of host to home country exchange rates, there is no impact on the Nigerian currency. This corroborates the work of Okafor (2014) in investigating FDI flows to SSA which suggests that unless data is aggregated, exchange rate hypothesis cannot overly influence FDI inflows to Nigeria.

10.3 Contributions to Knowledge for Theory and Practice

Insert Tables 21, 22 and 23 here

The main theoretical contributions of this study stem from the focus on a less researched aspect of FDI i.e., oil and gas FDI in a less developed country – Nigeria. The empirical results on the determinants of oil and gas FDI contributes to IB literature in two main ways. One, the study contributes to the understanding of the economic theory of FDI determinants proposed by Dunning (1979 1988 2009). By focusing on inward oil and gas FDI in Nigeria, couple with the shift in the observation point unlike previous studies (such as Vernon, 1966; Buckley and Casson, 1976; Dunning, 1988, 2001; Nyuur, 2014; Surdu and Mellahi, 2014), this study digs deeper and offers a detailed structure accounting for the heterogeneity of inward oil and gas FDI determinants by grouping the study observations into groups of OECD vs non-OECD home countries. Consistent with Dunning (1979, 1988, 2009) model, the study empirical results revealed that market-seeking, efficiency-seeking and strategic assets-seeking are significant positive motivations of oil and gas FDI in Nigeria (as a whole). Two, building on Dunning (1979, 1988, 2009) model, the study further examines the similarity and distinction between the estimated coefficients obtained for MNEs from OECD vs non-OECD home countries. From

the empirical results it is seen that the determinants differ when compared between OECD countries vs non-OECD countries FDI in Nigeria. The empirical results show that OECD countries are more attracted by market-seeking and efficiency-seeking, while the non-OECD countries have a higher desire for resources-seeking due to the size of the study estimated coefficients.

The empirical results on the impact of oil and gas FDI on both economic growth and export performance, contributes to the literature in three main ways. One, by accounting for the heterogeneity of investing MNEs (OECD vs non-OECD groups) in the study observations, the study throws light (empirically) to the understanding of FDI led economic endogenous growth theory and complementarity hypothesis of FDI led export performance. In terms of economic growth, the study shows that inward oil and gas FDI in Nigeria has a significant positive effect on economic growth (proxied by GDP per capita). However, the study shows that OECD countries oil and gas FDI impact on Nigeria's economic growth is higher compared to non-OECD countries oil and gas FDI. As regards export performance, the empirical results showed that inward oil and gas FDI in Nigeria has a significant positive effect on export performance in Nigeria (proxied by oil and gas exports). Also, from the empirical results, it is observed that the impact of non-OECD countries' oil and gas FDI is higher compared to OECD countries oil and gas FDI impact on Nigeria's foreign export. Thus, corroborate the complementarity hypothesis of FDI and trade nexus by providing empirical evidence using oil and gas FDI in Nigeria. In addition, this further deepens our understanding that the impact of oil and gas FDI on economic growth and export performance depends on the technological gap between the host and home economies. Two, unlike previous studies, the study employed recent dataset (####) and more advanced analytical techniques for panel data analysis (sys-GMM) considered to be more robust in eliminating the endogeneity problem identified in most of the previous studies on FDI-growth nexus (####), as well as FDI-export nexus (####).

With regards to practical implications for the government, the results suggest that the Nigerian government would need to implement selective investment promotion policies in order to maximise the desired inward oil and gas FDI from targeted MNEs between OECD and non-OECD countries (Zheng, 2013). For instance, from the empirical results found for the determinants of oil and gas FDI in Nigeria, it is observed that institutional/political risk (proxied by the rule of law) is only for non-OECD countries and insignificant for both country-level and OECD estimates. Trade liberalisation, infrastructure, interest rate and past oil and gas FDI is statistically significant for all the study observations. But financial crisis is not statistically significant for all the observations. However, these implications are further complemented with consideration to the empirical evidence found for oil and gas FDI impact on economic growth and export performance. From the empirical results, oil and gas FDI from OECD countries contributes more to Nigeria's economic growth, whereas oil and gas FDI from non-OECD countries contributes more to Nigeria's export performance. Another perspective to the practical implication of this study is to aid corporate managers decision-making and scholarly debate on the internationalisation of EMMNEs. Here, corporate managers that wants to maximise corporate competitiveness (particularly in the oil and gas sector in Nigeria) would select determinants that suit their country of origin (as seen for OECD vs non-OECD countries estimated coefficients).

10.4 Limitations and Recommendations for Future Research

This study has provided several insights (both theoretical and practical) on the determinants and impact of OGFDI in Nigeria. With these insights come opportunities for future research. For instance, the number of years of the data set use, and having some estimates at 10% level of significance in the results thus warrant some caution in the interpretation of the study results. This could be overcome by further research with larger dataset. Also, the primary focus of this study was on OGFDI, future research could develop on this by investigating whether

there is difference in terms of determinants and impact in relation to types of FDI (manufacturing, services) and its mode of entry (greenfield, M&A, vs joint venture etc). Future research could also exploit variables with longer data run and different explanatory variables to the ones used in this study (e.g., innovation/R&D, competition etc.) or a comparative analysis of the different regions in Nigeria. Following these recommendations would address some of the limitations of this study. Future research could also consider pre- and post-financial crisis as well as the economic implications of the ongoing global pandemic (due to Covid-19) on FDI determinants and impact. [The impact of oil and gas FDI on the economy and export performance could be examined further using other indicators relating to technology transfer, competition, employment and labour market effects either at the regional or country levels.](#) Conducting future research along these lines of enquiries recommended would further explain and refine existing or develop new theories on the determinants and impact of FDI/OGFDI in Nigeria.

10.5 Final Summary

Endowed with enormous natural resources but with a volatile economy, this study seeks to conduct an empirical analysis investigating the determinants and impact of inward oil and gas FDI on Nigeria economic growth and export performance. The study dataset covers a period of 17 years from 2001 to 2017 making a total observation of 306. The dataset would be analysed in three separate groups that are country-level as a whole, OECD group and non-OECD group. The OECD countries group is made up of 204 observations and non-OECD countries group is made up of 102 observations. The study dataset will be analysed using dynamic panel data analysis proposed by Blundell and Bond (1998) known in methodology literature as sys-GMM (system Generalized-Method-of-Moment). This empirical evidence provides statistical support that inward oil and gas FDI in Nigeria is determined by market-seeking (proxied by GDP per

capita), resource-seeking (proxied by fuel export) and efficiency-seeking (proxied by labour force and primary school enrolment). The study also found that inward oil and gas FDI in Nigeria has a significant positive effect on economic growth (for both GDP per capita and GDP annual % growth). As regards export performance, the empirical study results showed that inward oil and gas FDI in Nigeria has a significant positive effect on export performance in Nigeria (for both national exports, and oil and gas exports). The main contribution of this study for both theory and practice is that it provides empirical evidence on inward oil and gas FDI examining the heterogeneity of the investing MNEs.

References

Abdulmuttaled K. (2007) Determinant of Foreign Direct Investment and its impact on Economic Growth in Developing Countries. *MPRA Working Paper No.9457*.

Abogan, O.P., Akinola, E.B and Baruwa, O.I (2014) Non-Oil export and economic growth in Nigeria (1980-2011). *Journal of Research in Economics and International Finance*, 3(1) pp. 1-11.

Abor, J. Adjasi, C. K. D. and Hayford, M. (2008) How Does Foreign Direct Investment Affect the Export Decisions of Firms in Ghana? *African Development Review*, 20(3) pp. 23-48.

Acha, I. A., Michael, E. I., & Essien, J. M. (2017) Nigeria's Investment Environment: Issues of Economic Growth and Development. *Expert Journal of Finance*, 5(4) pp.1-19.

Adams, S., & Opoku, E. E. O. (2017) BRIC versus OECD foreign direct investment impact on development in Africa. *Foreign capital flows and economic development in Africa*. 33(2) pp.147-161.

Adebayo, O.O. and Daramola, O.A. (2013) Economic analysis of catfish (*Clarias gariepinus*) production in Ibadan metropolis. *Discourse Journal of Agriculture and Food Sciences*, 1(7): 128-134.

Adefolaju, T. (2014) Socio-Economic Impact Assessment of a Mono-Culture Economy: The Case of Nigeria. *Journal of Social Welfare and Human Rights*, 2(1) pp.161-175.

Adeleke, AI (2014) FDI-growth nexus in Africa: Does governance matter? *Journal of Economic Development*, 39(1) pp. 111–135.

Adeleye, J.O., Adetoye, O.S., and Adewuyi, M.O. (2015) Impact of International Trade on Economic Growth in Nigeria (1988-2012). *International Journal of Financial Research*, 6(3), 163-172.

Adeniran, J.O., S.A. Yusuf and Adeyemi, O.A. (2014) The impact of exchange rate fluctuation on the Nigerian economic growth: An empirical investigation. *International Journal of Academic Research in Business and Social Sciences*, 4(8): 224-233.

Adenugba, A.A. and Sotubo, O.D. (2013) Non-oil Exports in the Economic Growth of Nigeria: A study of Agriculture and Mineral Resources. *Journal of Educational and Social Research*, 1(2) pp.23-45.

Adeola, O. and Evans, O., (2017) Financial inclusion, financial development, and economic diversification in Nigeria. *The Journal of Developing Areas*, 51(3), pp.1-15.

Adewumi, A. (2015) Aquaculture in Nigeria: Sustainability Issues and Challenges. *Direct Research Journal of Agriculture and Food Science*, 3(2) pp.223-231.

Adewumi, A., & Olaleye, V. (2011) catfish Culture in Nigeria: Progress, Prospects and Problems. *African Journal of Agricultural Research*., 1281-1285.

Adewumi, S. (2007) The impact of FDI on growth in developing countries: An African experience. *Economic Modelling*, 3(25), pp. 793-810.

Adhikary, B. K. (2011) FDI, trade openness, capital formation, and economic growth in Bangladesh: a linkage analysis. *International Journal of Business and Management*, 6(1), pp.16-29.

Adhikary, B. K. (2012) Impact of Foreign Direct Investment, Trade Openness, Domestic Demand and Exchange Rate on Export Performance of Bangladesh: A VEC Approach. *Economics Research International*, 20(1) pp.23-38.

Adhikary, B.K. (2011) FDI, Trade Openness, Capital Formation, and Economic Growth in Bangladesh: A Linkage Analysis. *International Journal of Business and Management*, 6(1) pp.1-21.

Aigheyisi, O.S., (2015) Import Penetration, FDI Inflows and Non-Oil Export Performance in Nigeria (1981-2012): A Cointegration and Error Correction Analysis. *Botswana Journal of Economics*, 13(1) pp.22-40.

Aizeman J, Noy I (2005) Foreign Direct Investment and Trade – Two – way Linkage National Bureau of Economic Research. *Working Paper Series* no 11403.

Ajayi S.I (2006) FDI and Economics Development in African. *Paper Presented at the ADB/AERC International Conference in Accelerating African Development, Tunis. Nov., 22-24.*

Ajide, K, Adeniyi, O. and Raheem, I (2014) Does governance impact on the foreign direct investment-growth nexus in sub-Saharan Africa? Zagreb. *International Review of Economics and Business*, 17(2), pp.71–81.

Akin, M. S. (2009) How is the market size relevant as a determinant of FDI in developing countries? A research on population and the cohort size. A Paper presented at the International Symposium on Sustainable Development, June 9-10.

Akinlo, A.E. (2004) Foreign direct investment and growth in Nigeria: An empirical investigation. *Journal of Policy modelling*, 26(5), pp.627-639.

Akrami, Faramarz (2008) *Foreign Direct Investment in Developing Countries: Impact on Distribution and Employment, A Historical Theoretical and Empirical Study*. Ph.D. Thesis. The University of Fribourg.

Al-Sadig, A. (2009) The effects of corruption on FDI inflows. *Cato Journal*, 29(3), pp.267.

Albaladejo, M., (2003) Industrial realities in Nigeria: from bad to worse. *Queen Elizabeth House (QEH) Working Paper Series QEHWPS101*, pp.1-23.

Albert, W., & Brian, D. (2009) Host country corruption level and Foreign Direct Investments inflows. *International Journal of Trade and Global Markets*, 2(2), pp.68-178.

Albulescu, C. T., Briciu, L., & Coroiu, S. I. (2010) Determinants of foreign direct investment in CEECs: the role of financial stability. *Scientific Annals of the "Alexandru Ioan Cuza". Economic Sciences Section, Special Issue*, 1(2), pp.85-96.

Alfaro, L. (2003) Foreign direct investment and growth: Does the sector matter. *Harvard Business School*, 2(3), pp. 1-31.

Allan, AJ, Randy, LJ, (2005) *Writing the Winning Thesis or Dissertation. A Step-by-Step Guide*. California: Corwin Press.

Almfraji, M.A. and Almsafir, M.K. (2014) Foreign direct investment and economic growth literature review from 1994 to 2012. *Social Behaviour Science*. 129, pp.206- 213.

Alsan, Marcella, et, al. (2006) The Effect of Population Health on Foreign Direct Investment Inflows to Low- and Middle-Income Countries. *World Development*, 34(4), 613-630.

Altomonte, C., & Guagliano, C. (2003) Comparative study of FDI in Central and Eastern Europe and the Mediterranean. *Economic Systems*, 27(2), 223-246.

Ammani, A. A. (2011) Nigeria's oil boom period (1973-1983): Was Agriculture really neglected? *International Journal of Statistics and Applications*, 3(2), p.6-9.

Ang, J. B. (2008) Determinants of foreign direct investment in Malaysia. *Journal of policy modeling*, 30(1), pp.185-189.

Anyanwu, John C. (2012) Why Does Foreign Direct Investment Go Where It Goes? New Evidence from African Countries. *Annals of Economics and Finance*, 13(1), pp. 431 – 462.

Aqeel, A., Nishat, M., and Bilquees, F. (2004) The Determinants of Foreign Direct Investment in Pakistan. *The Pakistan Development Review* 1(2), pp.651-664.

Araujo, L., Mion, G., Ornelas, E. (2016) Institutions and Export Dynamics, *Journal of International Economics*, 98(9), pp. 2–20.

Arezki Rabah and Nguyen Ha (2020) *Coping with a Dual Shock: Covid-19 and Oil Prices*. World Health Organization, Geneva.

Asghar, N., Nasreen, S. and Rehman, H. (2011) Relationship between FDI and economic growth in selected Asian countries: A panel data analysis. *Review of Economics & Finance*, 5(7), pp. 84-96.

Asiedu, E. (2002) On the determinants of foreign direct investment to developing countries: is Africa different? *World development*, 30(1), pp.107-119.

Asiedu, E. (2006) Foreign direct investment in Africa: The role of natural resources, market size, government policy, institutions and political instability. *The World Economy*, 29(1), 63-77.

Asiedu, E., (2005) Foreign Direct Investment in Africa: The Role of Natural Resources, Market Size, Government Policy, Institutions and Political Instability. *United Nations University working paper no. 2*.

Asiedu, E., & A, Villamil. (2000) Discount Factors and Thresholds: Foreign Investment when Enforcement is Imperfect, *Macroeconomic Dynamics*, 4(1): pp.1–21.

Athukorala P and Menon J (1995) Developing with Foreign Investment Malaysia. *Australian Economic Review*, 28(1), pp.55-67.

Auty, R.M. (1994) Industrial policy reform in six large newly industrializing countries: The resource curse thesis. *World Development*, 22(1), pp. 11-26.

Aw, T.Y., & Tang, T.C. (2010) The Determinants of Inward Foreign Direct Investment: The Case of Malaysia *International Journal of Business and Society*, 11(1): 59-76.

Awad, A. and Ragab, H., (2018) The economic growth and foreign direct investment nexus: Does democracy matter? Evidence from African countries. *Thunderbird International Business Review*, 60(4), pp.565-575.

Ayanwale, Adeolu B. (2007) FDI and economic growth: Evidence from Nigeria. *The Journal of Developing Areas*, 53(4).

Ayodele, T. & Sotola, O. (2014) China in Africa: An evaluation of Chinese investment. *Initiative for Public Policy Analysis (IPPA) Working Paper No 324*.

Ayres, C.E. (1962) *theory of economic progress; a study of the fundamentals of economic development and cultural change*. New York: Schocken Books

Azam, M. (2010) An Empirical Analysis of the Impacts of Exports and Foreign Direct Investment on Economic Growth in South Asia, *Interdisciplinary Journal of Contemporary Research in Business*, 2(7), pp.65-78.

Azeez, B.A., Dada, S.O. & Aluko, O.A. (2014) Effect of International Trade on Nigerian Economic Growth: The 21st Century Experience. *International Journal of Economics, Commerce and Management*, 8(2), pp.43-56.

Aziza, N. I. B., Yahayab, S. N., Hariri, M., & Bakric, (2019) N. M. Intervention of Absorptive Capacity on the Relationship between Foreign Direct Investment and Economic Growth: A Systematic Approach. Autoregressive Distributed Lag Model. *Economic Systems* 38(2):269–287.

Babalola, S. J., Mohd, S., Ehigiamusoe, K. U., & Onikola, H. (2019) Impact of Foreign Direct Investment, Aid And Trade On Economic Growth In Nigeria. *The Journal of Developing Areas*, 53(4).

Babatunde, M. A. (2017) Foreign direct investment and export performance in Nigeria: a disaggregated analysis. *International Journal of Sustainable Economy*, 9(2), 142-158.

Babbie, E. R. (2010) *The Practice of Social Research*. New York: Cengage Learning.

Bada, T., & Rahji, M. (2010) Market Delineation Study of the Fish Market in Nigeria: An Application of Cointegration Analysis. *Journal of Agricultural Science*, 7(7), pp.158-159

Baharom, A.H., Habibullah, M.S. & Royfaizal, R.C. (2008) The relationship between trade openness, foreign direct investment and growth: case of Malaysia. *MPRA paper*. 11928.

Baharumshah, A.Z. & Almasaied, S.W. (2009) Foreign Direct Investment and Economic Growth in Malaysia: Interactions with Human Capital and Financial Deepening. *Emerging Markets Finance and Trade*. 45(1), pp.90-102.

Baharumshah, A.Z. & Almasaied, S.W. (2009) Foreign Direct Investment and Economic Growth in Malaysia: Interactions with Human Capital and Financial Deepening. *Emerging Markets Finance and Trade*. 45(1), pp.90-102.

Bajpai, N. (2011) *Business Research Methods*. India: Pearson Education.

Bakar, N. A. A., & Afolabi, L. (2017) Causality nexus between trade, political instability, FDI and economic growth: Nigeria experience. *International Journal of Trade and Global Markets*, 10(1), 75-82.

Balasubramanyam, V.N., Salisu, M. and Sapsford, D. (1996) Foreign direct investment and growth in EP and IS countries. *The economic journal*, pp. 92-105.

Barriers S, Gorg H and Strobl E (2003) Explaining Firms' Export Behaviour: R&D, Spillovers and the Destination Market. *Oxford Bulletin of Economics and Statistics*, 65(4).

Barry F and Brandley J (1997) FDI and Trade: The Irish Host- Country Experience. *The Economic Journal*, 107(445), pp.1798-1811.

Bassey, C.O. (2012) Resources Diversification for sustainable Economic Development in Nigeria.” *British Journal of Humanities and Social sciences*, 5(1), pp.234-247.

Bastiaens, I. (2016) The politics of foreign direct investment in authoritarian regimes. *International Interactions*, 42(1), 140-171.

Basu, M. A., & Srinivasan, M. K. (2002) Foreign direct investment in Africa: Some case studies. *IMF Working Paper No.* 02/06.

Basu, P., Chakraborty, C. and Reagle, D. (2003) Liberalization, FDI, and growth in developing countries: A panel cointegration approach. *Economic inquiry*, 41(3), pp. 510-516.

Belloumi, M. (2014) The Relationship between Trade, FDI and Economic Growth in Tunisia: An Application of the Autoregressive Distributed Lag Model. *Economic Systems* 38(2), pp.269–287.

Bénassy-Quéré, A., Coupet, M., & Mayer, T. (2007) Institutional determinants of foreign direct investment. *The World Economy*, 30(5), pp.764-782.

Benmamoun, M., & Lehnert, K. (2013) Financing growth: comparing the effects of FDI, ODA, and international remittances. *Journal of Economic Development*, 38(2), pp.43-54.

Bergstrand, et. al., (2007) A knowledge-and-physical-capital model of international trade, foreign direct investment, and multinational enterprises. *Journal of International Economics*, 73(2), pp.278-308.

Bernard, H.R. (2011) *Research Methods in Anthropology*. 5th edition. AltaMira Press: New York.

Bevan, A., Estrin, S., & Meyer, K. (2004) Foreign investment location and institutional development in transition economies. *International Business Review*, 13(5), pp.43–64.

Bhaduri, S. and Ray, A. (2004) Exporting through Technological Capability: Econometric Evidence from India's Pharmaceutical and Electrical/Electronics Firms. *Oxford Development Studies*, 32(1), pp.33-46.

Bhardwaj, A., Diets, J., & Beamish, P. (2007) Host country culture influences on foreign direct investment. *Management International Review*, 47(9), pp.29–50.

Bhavan, T., Xu, Changsheng., & Zhong, C. (2011) Determinants and Growth Effect of FDI in South Asian Economies:Evidence from a Panel Data Analysis, *International Business Research*, 4(1), pp.67-89.

Blaikie, N. (2010) *Designing Social Research*. Polity Press: Cambridge.

Blake, A.P. and Pain, N., (1994) *Investigating structural changes in UK export performance: the role of innovation and direct investment*. London: National Institute of Economic and Social Research.

Blomström, M. and Persson, H., (1983) Foreign investment and spillover efficiency in an underdeveloped economy: evidence from the Mexican manufacturing industry. *World development*, 11(6), pp.21-35.

Blomström, M., (1986) Foreign investment and productive efficiency: the case of Mexico. *The Journal of Industrial Economics*, 9(2), pp.89-104.

Blonigen, B. A. (1997) Firm-specific assets and the link between exchange rates and foreign direct investment. *The American Economic Review*, 7(3), pp.447-465.

Blonigen, B. A. (2005) A review of the empirical literature on FDI determinants. *Atlantic Economic Journal*, 33(4), 383-403.

Blonigen, B. A., & Feenstra, R. C. (1996) The Effects of US Trade Protection and Promotion Policies. *NBER Working Paper No.5285*

Blundell, R. and Bond, S. (1998) Initial conditions and moment restrictions in dynamic panel data models. *Journal of Econometrics*, 87(1), pp.115-143.

Boddin, D., Raff, H., & Trofimenko, N. (2017) Foreign ownership and the export and import propensities of developing-country firms. *The World Economy*, 40(12), pp.2543-2563.

Boghean, C., & State, M. (2015) The Relation between Foreign Direct Investments (FDI) and Labour Productivity in the European Union Countries. *Procedia Economics and Finance*, 32(7), 278-285.

Bon Van, N. (2019) The role of institutional quality in the relationship between FDI and economic growth in Vietnam: Empirical evidence from provincial data. *The Singapore Economic Review*, 64(03), pp.601-623.

Bordo, M. D. – Meissner, Ch. M. (2006) The Role of Foreign Currency Debt in Financial Crises: 1880 – 1913 vs. 1972 – 1997. *Journal of Banking and Finance*, 30(12), pp. 3299 – 3329.

Borensztein, E. De Gregorio, J-W. Lee. (1998) How does Foreign Direct Investment Affect Economic Growth. *Journal of International Economics*, 45(1), pp.115 – 135.

Borensztein, E., De Gregorio, J. and Lee, J. (1998) How does foreign direct investment affect economic growth? *Journal of International Economics*, 45(1), pp. 115-135.

Boudier-Bensebaa, Fabienne (2008) FDI-assisted development in the light of the investment development path paradigm: Evidence from Central and Eastern European countries. *Transnational Corporations*, 17(1), pp.56-69.

Bournakis, I., Tsoukis, C. (2016) Government Size, Institutions, and Export Performance among OECD Economies. *Economic Modelling*, 53(5), pp. 37–47.

Brada, J. C., Kutan, A. M., & Yigit, T. M. (2006) The effects of transition and political instability on foreign direct investment inflows. *Economics of Transition*, 14(4), 649-680.

Braunerhjelm, P. and Svensson, R. (1996) Host country characteristics and agglomeration in foreign direct investment. *Applied Economics*, 28(7), pp. 833-840.

Brouthers, K.D. and Brouthers, L.E. (2000) Acquisition or Greenfield start-up? Institutional, cultural and transaction cost influences. *Strategic Management Journal*, 21(1), pp. 89-97.

Brown R. B. (2006) *Doing Your Dissertation in Business and Management: The Reality of Research and Writing*. London: Sage Publications.

Bryman A. & Bell, E. (2015) *Business Research Methods*. 4th edition. Oxford: Oxford University Press.

Bryman, A. (2012) *Social Research Methods*. 4th edition. Oxford: Oxford University Press.

Buckley P., Clegg J., & Wang C. (2002) The impacts of FDI on the performance of Chinese Manufacturing Firms, *Journal of International Business Studies*, 19(2), pp.55-67.

Buckley, P. J et, al. (2001). Increasing the Size of the Country": Regional Economic Integration and Foreign Direct Investment in a Globalised Economy. *Management International Review*, 41 (3), pp.251-274.

Buckley, P. J. (2016) The contribution of internalisation theory to international business: New realities and unanswered questions. *Journal of World Business*, 51(1), pp.74-82.

Buckley, P. J., & Carter, M. J. (1999) Managing cross-border complementary knowledge: conceptual developments in the business process approach to knowledge management in multinational firms. *International Studies of Management & Organization*, 29(1), 80-104.

Buckley, P. J., & Strange, R. (2011) The governance of the multinational enterprise: Insights from internalization theory. *Journal of Management Studies*, 48(2), 460-470.

Buckley, P. J., Clegg, L. J., Cross, A. R., Liu, X., Voss, H., & Zheng, P. (2007) The determinants of Chinese outward foreign direct investment. *Journal of international business studies*, 38(4), 499-518.

Buckley, P. J., Cross, A. R., Tan, H., Xin, L., & Voss, H. (2008) Historic and emergent trends in Chinese outward direct investment. *Management International Review*, 48(6), 715-748.

Buckley, P.J. and Casson, M. (1976) *The future of the multinational enterprise*. London: Macmillan.

Burger, M.J., Van Oort, F.G. and Van der Knaap, B. (2008) A treatise on the geographical scale of agglomeration externalities and the modifiable areal unit problem. ERIM Working Paper No. 29.

Bykova, A., & Lopez-Iturriaga, F. (2018) Exports-performance relationship in Russian manufacturing companies. *Baltic Journal of Management*.

Cabral, L. (1995) Sunk Costs, Firm Size and Firm Growth, *Journal of Industrial Economics* 43(2), pp.23-37.

Calvo, G. A., Leiderman, L., & Reinhart, C. M. (1996) Inflows of Capital to Developing Countries in the 1990s. *The Journal of Economic Perspectives*, 10(2), 123-139.

Camarero, M. & Tamarit, C. (2004) Estimating exports and imports demand for manufactured goods: The role of FDI, *Review of World Economics*, 140(3), pp.347-375.

Camarero, M., Gómez-Herrera, E., and Tamarit, C. (2018) New Evidence on Trade and FDI: how Large is the Euro Effect? *Open Economies Review*, 29(2), pp.451–467.

Cambridge Advance Learner's dictionary, o. (2017) *Viability*. UK. Cambridge University Press.

Campos, J.E., Lien, D., & Pradhan, S. (1999) The Impact of Corruption on Investment: Predictability Matters, *World Development*, 27 (6), 1059–67.

Campos, Nauro et, al. (2003) Why Does FDI Go Where it Goes? New Evidence from the Transition Economies, *IMF Working Paper* no. WP/03/228.

Cantwell, J. and Piscitello, L. (2002) The location of technological activities of MNCs in European regions: The role of spillovers and local competencies. *Journal of International Management*, 8(1), pp. 69-96.

Cantwell, J., & Narula, R. (2003) *International Business and the Eclectic Paradigm: developing the OLI framework*. London: Routledge.

Cantwell, J., & Narula, R. (Eds.) (2007) *International Business and the Eclectic Paradigm: developing the OLI framework*. Paris: Routledge.

Cantwell, J., Dunning, J. H., & Lundan, S. M. (2010) An evolutionary approach to understanding international business activity: The co-evolution of MNEs and the institutional environment. *Journal of International Business Studies*, 41(4), 567-586.

Carkovic, M., & Levine, R. (2005) Does foreign direct investment accelerate economic growth? *University of Minnesota Working Paper no.195*.

Carr, D.L., Markusen, J.R., & Maskus, K.E. (2001) Estimating the Knowledge-Capital model of the Multinational Enterprise. *American Economic Review*, 91(9), pp.693-708.

Carstensen, K., & Toubal, F. (2004) Foreign direct investment in Central and Eastern European countries: a dynamic panel analysis. *Journal of comparative economics*, 32(1), 3-22.

Casson, M. (2015) Coase and International Business: The Origin and Development of Internalisation Theory. *Managerial and Decision Economics*, 36(1), pp. 55-66.

Casson, M., Porter, L., & Wadeson, N. (2016) Internalization theory: An unfinished agenda. *International Business Review*, 25(6), pp.1223-1234.

CBN (2013) Modelling the External Sector of the Nigerian Economy. CBN Research Department.

Central Bank of Nigeria (2008) Statistical Bulletin, Golden Jubilee Edition.

Central Bank of Nigeria (2013) Annual Report of the Year Ended 31st December. Abuja: Central Bank of Nigeria.

Central Bank of Nigeria (2014) Annual Report of the Year Ended 31st December. Abuja: Central Bank of Nigeria.

Central Bank of Nigeria (2015) Annual Report of the Year Ended 31st December. Abuja: Central Bank of Nigeria.

Central Bank of Nigeria (2016) Annual Report of the Year Ended 31st December. Abuja: Central Bank of Nigeria.

Central Bank of Nigeria (2017) Annual Report of the Year Ended 31st December. Abuja: Central Bank of Nigeria.

Cetin, R. and Altinas, H. (2006) A Review of Empirical Studies on Foreign Direct Investment and Trade. *Erciyes Universitesi Iktisadi Working Paper no. 27*.

Çevis, I. and Camurdan, B., (2009) The economical determinants of foreign direct investment (FDI) in developing countries and transition economies. *E-Journal of New World Sciences Academy*, 4(3), p.3C0015.

Chakrabarti, A. (2001) The determinants of foreign direct investments: Sensitivity analyses of cross-country regressions. *Kyklos*, 54(1), 89-114.

Chang, Ha-Joon (2007) How did the rich countries become rich? In *Bad Samaritans: the myth of free trade and the secret history of capitalism*. London: Bloomsbury Press.

Chen, H. and Hu, M.Y. (2002) An analysis of determinants of entry mode and its impact on performance. *International Business Review*, 11(2), pp.193-210.

Chinago, A.B. , Clinton, A. and Ameh, E.F. (2015) Geographical Survey of Nigerian Mineral Resources: A Step toward Planned development. *Journal of Culture, Society and Development*. 6(2), pp.24-38.

Chowdhury, A., and Mavrotas, G. (2006) FDI and Growth: What Causes What? *World economy* 29(1), pp.9-19.

Chuhan, P., Perez-Quiros, G., & Popper, H. (1996) International capital flows: do short-term investment and direct investment differ? *Policy Research Working Paper 1669*.

Cipollina, M., Demaria, F., Pietrovito. (2016) Determinants of Trade: the Role of Innovation in Presence of Quality Standards, *Journal of Industry, Competition and Trade*, 16(4), pp.455–475.

Clarke, R. and Logan, T-M., (2008) Emerging FDI Patterns in the CARICOM Region. *Journal of International Business Research* 8 (1), pp.16-23.

Cleeve, E. (2004) How effectiveness are fiscal incentives to attract FDI to sun-Saharan Africa. *Paper Presented at the IAABD 5th International Conference Atlanta, 20th April*.

Coase, R.H. (1937) The nature of the firm. *Economica*, 4(16), pp. 386-405.

Cohen, L, Manion, L, Morrison, K & Morrison, RB, (2007) *Research Methods in Education*. London: Routledge.

Collis, J. & Hussey, R. (2014) *Business Research: A Practical Guide for Undergraduate and Postgraduate Students* 4th edition. New York: Palgrave Macmillan.

Correa-López, M, Doménech R. (2012) The internationalisation of Spanish firms, *BBVA Research Working Paper*, 12/30.

Coughlin, C. C., Terza, J. V., & Arromdee, V. (1991) State characteristics and the location of foreign direct investment within the United States. *The Review of economics and Statistics*, 2(7), pp.675-683.

Crowther, D. & Lancaster, G. (2008) *Research Methods: A Concise Introduction to Research in Management and Business Consultancy*. London: Butterworth-Heinemann.

Cuervo-Cazurra, A. (2006) Who cares about corruption?, *Journal of International Business Studies*, 37(6), pp.807–822.

Culem, C. G. (1988) The locational determinants of direct investments among industrialized countries. *European economic review*, 32(4), pp.885-904.

Dabour, Nabil Md. (2000) *The Role of Foreign Direct Investment (FDI) in Development and Growth in OIC Member Countries*, *Journal of Economic Cooperation*, 21(3), pp.27-55.

Dang, T. A. (2015) Similarities Attract: Political Regimes and Foreign Direct Investments. *Journal of Political Sciences and Public Affairs*, 3(2), pp.1-7.

Daniels, J.D., Radebaugh, L.H., & Sullivan, D.P. (2002) *Globalization and Business*. Upper Saddle River, New Jersey: Prentice Hall.

Dasgupta, S., Mody, A., & Sinha, S. (1996) Japanese multinationals in Asia. *Policy Research Working Paper No.1634*.

Dauda, R.O.S. (2009) The Impact of FDI on Nigeria's Economic Growth: Trade Policy Matters. *Journal of Business and Policy Research*, 3(2), pp63-79.

Daude Christian and Stein, Ernesto, (2007) The Quality of Institutions and Foreign Direct Investment. *Economics and Politics* 19(3), pp.317-344.

De Gregorio, J., (2003) The role of foreign direct investment and natural resources in economic development. *Central Bank of Chile Working Paper* No 196.

De Jager, J. (2004) Exogenous and Endogenous Growth. *University of Pretoria Working Paper no.89*.

De Mello, L.R. (1999) Foreign direct investment-led growth: evidence from time series and panel data. *Oxford economic papers*, 51(1), pp.133-151.

De Mooij, R. A., & Ederveen, S. (2003) Taxation and foreign direct investment: a synthesis of empirical research. *International tax and public finance*, 10(6), pp.673-693.

De Soysa, I. (2002) Ecoviolence: Shrinking pie, or honey pot? *Global Environmental Politics*, 2(4), pp.1-34.

Deichmann Joel Ian (2003) Foreign Direct Investment in the Eurasian Transition States. *Eastern European Economics* 41(1), pp.5-34.

Deichmann, J.I., Eshghi, A., Haughton, D.M., Sayek, S., & Teebagey. N.C. (2003) Foreign direct investment in the Eurasian transition states. *Eastern European Economics*, 41(1), pp.5-34.

Desai, M. A., Foley, C. F., & Forbes, K. J. (2008) Financial constraints and growth: Multinational and local firm responses to currency depreciations. *Review of Financial Studies*, 21(6), pp.2857-2888.

DiMaggio, P. L., & Powell, W. W. (1983) The iron cage revisited: Institutional isomorphism and collective rationality in organisational fields. *American Sociological Review*, 48(9), pp.147-160.

Dinda, S. (2008) Factors determining FDI to Nigeria: an empirical investigation. *American Economic Review*, 91(5), pp.693-708.

Dode, R.O. (2012) Nigeria, Mono-Product Economy & The Global Economic Recession: Problems & Prospects. *Global Journal of Human Social Science Sociology*, 12(11), pp.123-146.

Dollar, D and Kraay, A. (2011) Trade, Growth and Poverty. *The Economic Journal*. 114(493), pp.22-49.

Driffield, N., & Jones, C. (2013) Impact of FDI, ODA and migrant remittances on economic growth in developing countries: A systems approach. *The European Journal of Development Research*, 25(2), 173-196.

Duanmu, J. L. (2014) State-owned MNCs and Host Country Expropriation Risk: The Role of Home State Soft Power and Economic Gunboat Diplomacy. *Journal of International Business Studies* 45(8), pp.1044-1060.

Dudovskiy, J. (2014) *The Ultimate Guide to Writing a Dissertation in Business Studies*. New York: BV Inc.

Dunning, J. H (1998) Location and the multinational enterprise: A neglected factor? *Journal of International Business Studies*, 29(1), pp. 45–66.

Dunning, J. H. (2000) The eclectic paradigm as an envelope for economic and business theories of MNE activity. *International business review*, 9(2), 163-190.

Dunning, J. H. (2006) Comment on Dragon multinationals: New players in 21 st century globalization. *Asia Pacific Journal of Management*, 23(2), 139-141.

Dunning, J. H. (2009) Location and the multinational enterprise: A neglected factor&quest. *Journal of 5international business studies*, 40(1), 5-19.

Dunning, J. H., & Lundan, S. M. (2008) Institutions and the OLI paradigm of the multinational enterprise. *Asia Pacific Journal of Management*, 25(4), 573-593.

Dunning, J. H., & Zhang, F. (2008) Foreign direct investment and the locational competitiveness of countries. *Transnational corporations*, 17(3), pp.1-25.

Dunning, J.H. (1980) Toward an eclectic theory of international production: some empirical tests', *Journal of International Business Studies*, 11(1), 9–31.

Dunning, J.H. (1988) The eclectic paradigm of international production: a restatement and some possible extensions. *Journal of International Business Studies*, pp. 1-31.

Dunning, J.H. (1993) *Multinational Enterprises and the Global Economy*, Addison-Wesley Publishing Company: Reading, MA.

Dunning, J.H. (2001) The eclectic (OLI) paradigm of international production: past, present and future. *International journal of the economics of business*, 8(2), pp. 173-190.

Dupasquier, C. and Osakwe, P.N., (2006) Foreign direct investment in Africa: Performance, challenges, and responsibilities. *Journal of Asian Economics*, 17(2), pp.241-260.

Easterby-Smith, M, Thorpe, R. & Jackson, P. (2008) *Management Research*. 3rd ed. London: SAGE Publications Ltd.

Easterly, W., & Rebelo, S. (1993) Fiscal policy and economic growth. *Journal of monetary economics*, 32(3), 417-458.

Easterly, William (2001) The lost decades: Explaining developing countries' stagnation in spite of policy reform, 1980-1998. *Journal of Economic Growth*, 6(2), pp.135-157.

Edison, H. J. – Levine, R. – Ricci, L. A. – Slok, T. (2002) International Financial Integration and Economic Growth. *Journal of International Money and Finance*, 21(6), pp.749 – 776.

Edwards, S. (1992) Trade orientation, distortions and growth in developing countries. *Journal of Development Economics*, 39(8), pp.31-57.

Eko, S.A., Utting, C.A. & Onun, E.U. (2013) Beyond Oil: Dual-Imperatives for Diversifying the Nigerian Economy. *Journal of Management and Strategy*, 4(3), pp.48-75.

Elboiashi, H.A. (2011) *The effect of FDI and other foreign capital inflows on growth and investment in developing economies*. PhD Thesis, University of Glasgow.

Enimola, S. S. (2011) Foreign direct investment and export growth in Nigeria. *Journal of Economics and International Finance*, 3(11), pp.586-605.

Eryigit, M. (2012) The Long Run Relationship between FDI, Export and Gross Domestic Product: Panel Data Implications. *Theoretical and Applied Economics*, 19(10), pp.71-82.

Esekumemu (2016) The Politics of Oil in Nigeria: Transparency and Accountability for Sustainable Development in the Niger Delta. *American International Journal of Contemporary Research*, 6(4), pp.234-258.

Esteves, P.S., Rua, A. (2015) Is There a Role for Domestic Demand Pressure on Export Performance?, *Empirical Economics*, 49(4), pp. 1173–1189.

Ewetan, O.O. and Okodua, H. (2013) Econometric analysis of exports and economic growth in Nigeria. *Journal of Business Management and Applied Economics*, 2(3), pp.1-14.

Faeth, I. (2009) Determinants of foreign direct investment – a tale of nine theoretical models”, *Journal of Economic Surveys*, 23(1), pp.165-196.

Fakoya, K.A., Sokefun O.B., Owodeinde, F.G., Akintola, S.L. and Adewolu, M.A. (2009) Emerging Research Priorities for the Aquaculture Sector in Sub-Saharan Africa- A case study of Nigeria. Aquaculture, Aquarium, Conservation and Legislation. *International Journal of the Bio flux Society*, 2(4), 407-424.

Falki, N. (2009) Impact of foreign direct investment on economic growth in Pakistan. *International Review of Business Research Papers*, 5(5), pp. 110-120.

Fallon, G. and Cook, M. (2010) Exploring the Regional Distribution of Inbound Foreign Direct Investment in the UK in Theory and Practice: Evidence from a Five-Region Study, *Regional Studies*, 44(3), pp. 337–353.

Fan, Joseph et, al., (2009) Institutions and Foreign Direct Investment: China versus the Rest of the World. *World Development*, 37(4), pp.852-865.

FAO (2003) A Study of the Trade in Smoked-Dried Fish from West Africa to the United Kingdom. *Food and Agriculture Organization Fisheries Circular No. 981*.

Fapetu, O. and J.A. Oloyede, (2014) Foreign exchange management and the Nigerian economic growth (1970-2012). *European Journal of Business and Innovation Research*, 2(2): pp.19-31.

Faria, Andre and Paolo Mauro (2004) Institutions and the External Capital Structure of Countries. *IMF Working Paper*, 04/236.

Faroh, A., & Shen, H. (2015) Impact of interest rates on foreign direct investment: Case study Sierra Leone Economy. *International Journal of Business Management and Economic Research*, 6(1), pp.124-132.

Fawole, I., Egbookhare, F.O., Itiola, O.A., Odejide, A.I. and Olayinka, A.I (2006) *Definition, Spectrum and Types of Research* in Olayinka, A.I, Taiwo, V.O, Raji-Oyelade, A and Farai, I.P (Ed.), *Methodology of Basic and Applied Research*, 8(3), pp. 11-27.

Fay M., Perotti R., Canning D. (1994) *Infrastructure and Growth, In International Differences in Growth Rates: Market Globalization and Economic Areas*, edited by M. Baldassarri and L. Paganetto. New York: St. Martin's Press, Inc.

Fernandez-Arias et, al. (2000) Getting It Right: What to Reform in the International Financial Markets. *Inter-American Development Bank Working Papers*, No. 428.

Fernandez-Arias, E., & Montiel, P. J. (1996) The surge in capital inflows to developing countries: an analytical overview. *The World Bank Economic Review*, 10(1), 51-77.

Folarin, S.F. (2010) *National Role Conceptions and Nigeria's African Policy, 1985-2007*. Ph.D Thesis, Department of Political Science and International Relations, Covenant University, Ota, Nigeria.

Frenkel, M., Funke, K., & Stadtmann, G. (2004) A panel analysis of bilateral FDI flows to emerging economies. *Economic systems*, 28(3), pp.281-300.

Freund, C.L. and Weinhold, D. (2004) The effect of the Internet on international trade. *Journal of International Economics*, 62(1), pp. 171-189.

Frimpong, J.M. and Oteng-Abayie, E.F. (2006) Bivariate causality analysis between FDI inflows and economic growth in Ghana. *MPRA Paper No. 351*.

Froot, K. A., & Stein, J. C. (1991) Exchange rates and foreign direct investment: an imperfect capital markets approach. *The Quarterly Journal of Economics*, 106(4), 1191-1217.

Fu, X., (2005) Exports, technical progress and productivity growth in a transition economy: a non-parametric approach for China. *Applied Economics*, 37(7), pp.78-104.

Gajewski, P., & Tchorek, G. (2017) What drives the export performance of firms in Eastern and Western Poland?. *European Planning Studies*, 25(12), pp.2250-2271.

Gastanaga, V., Nugent, J., & Pashamiova, B. (1998) Host Country Reforms and FDI Inflows: How Much Difference Do They Make? *World Development* 26(7), pp.1299-1314.

Gawad, G. M. A., & Muramalla, V. S. S. R. (2013) Foreign Direct Investment (FDI) and Its Effects On Oil, Gas And Refinery Production and Their Exports: An Applied Study. *Journal of Economics and Sustainable Development*, 4(1), pp.21-35.

Gedik, M.A. (2013) Determinants of Foreign Direct Investment for OECD Countries: Evidence from Dynamic Panel Data Analysis. *British Journal of Economics, Finance and Management Sciences*, 7(2), pp.119-140.

Gemmell, N. (1996) Evaluating the impacts of human capital stocks and accumulation on economic growth: some new evidence. *Oxford bulletin of economics and statistics*, 58(1), 9-28.

Gholami, Roghieh, Lee (2006) The Causal Relationship between Information and Communication Technology and Foreign Direct Investment. *The World Economy*, 29(1), 43-62.

Githaiga, P., Nyauncho, J., & KABIRU, C. G. (2015) Foreign Direct Investments and Economic Growth: The Primary Drivers. *Asian Journal of Finance & Accounting*, 7(2), pp.93-106.

Globerman, S., & Shapiro, D. (2002) Global foreign direct investment flows: The role of governance infrastructure. *World development*, 30(11), pp.1899-1919.

Globerman, S., & Shapiro, D. (2003) Governance infrastructure and US foreign direct investment. *Journal of International Business Studies*, 34(1), pp.19-39.

Göçer, İ. (2013) Ar-Ge Harcamalarının Yüksek Teknolojili Ürün İhracatı, Dış Ticaret Dengesi ve Ekonomik Büyüme Üzerindeki Etkileri. *Maliye Dergisi*, 165(2), 215-240.

Goddard, W. & Melville, S. (2004) *Research Methodology: An Introduction*, 2nd edition. London, Blackwell Publishing.

Godwin, E.S. and Cook, M., (2018) Determinants of Greenfield emerging market outward FDI into the UK. *International Journal of Emerging Markets*, 13(3), pp.460-477.

Gorg H and Greenaway D (2004) Much Ado about Nothing? Do Domestic Firms Benefit from Foreign Direct Investment? *The World Bank Research Observer*, 19(2), pp.171-197.

Goswami, C., & Saikia, K. K. (2012) FDI and its relation with exports in India, status and prospect in north east region. *Procedia-Social and Behavioral Sciences*, 37, pp.123-132.

Gouidar, A., & Nouria, R. (2014) The Impact of Misalignment on FDI in the Developing Countries. *International Journal of Economics and Financial Issues*, 4(4), pp.784-798.

Greenaway, D., Sousa, N. and Wakelin, K., (2004) Do domestic firms learn to export from multinationals?. *European Journal of Political Economy*, 20(4), pp.1027-1043.

Greene, W. H. (1997) *Econometric Analysis*. New Jersey: Pearson.

Grosse, R., & Trevino, L. J. (2005) New institutional economics and FDI location in Central and Eastern Europe. *Management International Review*, 45, pp.123–145.

Gulati, P. M. (2009) *Research Management: Fundamental and Applied Research*. India: Global India Publications.

Habib, M. and Zurawicki, L. (2002) Corruption and foreign direct investment. *Journal of International Business Studies*, 62(9), pp. 291-307.

Haile, M.G. and Pugh, G. (2013) Does exchange rate volatility discourage international trade? A meta-regression analysis. *The Journal of International Trade & Economic Development*, 22(3), pp. 321-350.

Hailu, Z. A. (2010) Demand side factors affecting the inflow of foreign direct investment to African countries: does capital market matter?. *International Journal of Business and Management*, 5(5), pp.104-125.

Hailu, Z.A. (2010) Impact of foreign direct investment on trade of African countries. *International Journal of economics and Finance*, 2(3), pp.122-136.

Hailu, Z.A. (2010) Impact of Foreign Direct Investment on Trade of African Countries, *International Journal of Economics and Finance*, 2,122-133.

Hailu, Z. A. (2010) Demand side factors affecting the inflow of foreign direct investment to African countries: does capital market matter?. *International Journal of Business and Management*, 5(5), 104-138.

Hansen, H., and Rand, J. (2006) On the Casual Links between FDI and Growth in Developing Countries (Foreign Direct Investment). *World Economy*, 29(1), 21-41.

Hanson II, J. R. (1996) Human capital and direct investment in poor countries. *Explorations in Economic History*, 33(1), 86-106.

Hartman, D. G. (1984) Tax policy and foreign direct investment in the United States. *National tax journal*, 8(2), pp.475-487.

Hashmi, S. H., Hongzhong, F., & Ullah, A. (2020) Effect of Political Regime, Trade Liberalization and Domestic Investment on FDI Inflows in Pakistan: New Evidence Using ARDL Bounds Testing Procedure. *International Journal of Information, Business and Management*, 12(1), pp.33-56.

Hausman, J. A., & Taylor, W. E. (1981) Panel data and unobservable individual effects. *Econometrica: Journal of the Econometric Society*, 4(2), pp.1377-1398.

Hayakawa, K. and Kimura, F. (2009) The effect of exchange rate volatility on international trade in East Asia. *Journal of the Japanese and International Economies*, 23(4), pp. 395-406.

Hecock, R.D. and Jepsen, E.M. (2013) Should countries engage in a race to the bottom? The effect of social spending on FDI. *World Development*, 44(1), pp.156-164.

Heliso, O. S. (2014) *The Impact of Foreign Direct Investment on Export in COMESA Countries*. Master Thesis. Department of Economics, University of Ottawa.

Helpman, E. (1984) A simple theory of international trade with multinational corporations, *Journal of Political Economy*, 92 (3), pp.451–471.

Henisz, Witold J. (2000) The Institutional Environment for Multilateral Investment. *Journal of Law, Economics and Organization*, 16(2), pp.334–364.

Hennart, J. (1982) *A theory of multinational enterprise*. Michigan: University of Michigan Press.

Hermes, N. & Lensink, R. (2003) Foreign direct investment, financial development and economic growth. *The Journal of Development Studies*. 40(1), pp.142-163.

Herzer, D. Klasen, S. and Nowak-Lehmann, F. D. (2008) In search of FDI-led growth in developing countries: the Way forward. *Economic Modelling*, 25, pp. 793-810.

Hesse, H. (2008) Export Diversification and Economic Growth. *International Bank for Reconstruction and Development/World Bank, Commission on Growth and Development Working Paper No. 21*.

Ho, C.S., & Rashid H.A. (2011) Macroeconomic and Country Specific Determinants of FDI. *The Business Review*, 18(1), pp.219-226.

Ho, S., Kauffman, R.J. and Liang, T. (2007) A growth theory perspective on B2C e-commerce growth in Europe: An exploratory study. *Electronic Commerce Research and Applications*, 6(3), pp. 237-259.

Hymer, S. (1960) *On multinational corporations and foreign direct investment. The Theory of Transnational Corporations*. London: Routledge for the United Nations.

Hymer, S.H. (1960) *The international operations of national firms: a study of direct investment*, Ph.D thesis, MIT.

Hyttenget, E., (2014) The Nexus of FDI-Absorptive Capacity and GDP growth in Sub-Saharan Africa. *Contemporary Economic Policy*. 19(2). pp.175-185.

Iamsiraroj, S.; Ulubasoglu, M. (2015) Foreign Direct Investment and Economic Growth: A Real Relationship or Wishful Thinking. *Econ. Model.* 51, pp.200–213.

Ibrahim and Sadiat (2010) *Determinant of Foreign Direct Investment in Nigeria: Political Factor Effect Revisited*. Ph.D. Thesis. The University of Lagos.

Ijeoma, M. M., Ezeamama, M., & Ebisi, L. N. (2018) Economic Policy Management in Nigeria: Effective Diversification Approaches. *International Journal of Academic Research in Accounting, Finance and Management Sciences*, 8(4), pp.195-203.

Imoudu, E.C., (2012) The impact of foreign direct investment on Nigeria's economic growth; 1980-2009: Evidence from the Johansen's cointegration approach. *International Journal of Business and Social Science*, 3(6), pp.55-75.

Ismail, Wana N. (2013) Innovation and High-Tech Trade in Asian Indonesian pharmaceutical sector: firm level evidence, *Applied Economics*, 45(3), pp.78-97.

Itumo, V.N. (2016) Nigeria's Mono-Cultural Economy: Impact Assessment and Prospects. *European Journal of Interdisciplinary Studies*, 8(3), pp.23-47.

Iwamoto, M. and Nabeshima, K. (2012). Can FDI Promote Export Diversification and Sophistication of Host Countries? Dynamic Panel System GMM Analysis. *Institute of Developing Economies Discussion Paper No. 347*.

Jayachandran, G. and Seilan, A. (2010) A causal relationship between trade, foreign direct investment and economic growth for India. *International research journal of finance and economics*, 42(1), pp.74-88.

Jayaraman, T.K., Choong, C.K. & Ng, C.F. (2017) Foreign direct investment and growth in India: Does financial sector development help in improving absorptive capacity?. *International Journal of Business and Society*. 18(1). pp.171-188.

Jeffrey, W. (2002) *Econometric analysis of cross section and panel data*. Cambridge, MA: MIT Press.

Jensen, Nathan M. (2008) Political Regimes and Political Risk: Democratic Institutions and Expropriation Risk for Multinational Investors. *Journal of Politics*, 70(4), pp.1040–1052.

Jeon B. N. and Rhee S. S., 2008. The Determinants of Korea's Foreign Direct Investment from the United States, 1980-2001: An Empirical Investigation of Firm Level Data. *Contemporary Economic Policy*, 26(1), 118-131.

Jevcak, A., Setzer, R., Suardi, M. (2010) Determinants of Capital Flows to the New EU Member States before and during the Financial Crisis. *European Commission, Economic Papers No. 425*.

Jiménez, A. (2011) Political risk as a determinant of Southern European FDI in neighbouring developing countries. *Emerging Markets Finance and Trade*, 47(4), pp.59-74.

Johanson, J., & Wiedersheim-Paul, F. (1975) The internationalization of the firm: Four Swedish cases, *Journal of Management Studies*, 12 (3), pp.305-322.

Johanson, J., & Vahlne, J. E. (2003) Business relationship learning and commitment in the internationalization process. *Journal of international entrepreneurship*, 1(1), pp.83-101.

Johanson, J., & Vahlne, J. E. (2009) The Uppsala internationalization process model revisited: From liability of foreignness to liability of outsidership. *Journal of international business studies*, 40(9), pp.1411-1431.

Johanson, J., & Vahlne, J.E. (1977) The internationalization process of the firm – A model of knowledge development and increasing foreign market commitment. *Journal of International Business Studies*, 8 (1), pp. 23-32.

John, E. I. (2016) Effect of foreign direct investment on economic growth in Nigeria. *European Business & Management*, 2(2), pp.40-46.

Johnson, A. (2006) The effects of FDI inflows on host country economic growth. *The Royal Institute of technology Working Paper no. 23*.

Jones, G. I. (2000) *The Trading States of the Oil Rivers: a study of political development in eastern Nigeria*. LIT Verlag Münster.

Jongwanich, J. (2010) Determinants of Export Performance in East and Southeast Asia. *The world economy*, 33(1), pp.20-41.

Joshi, R.M. (2015). *International Marketing*. New Delhi: Oxford University Press.

Kabaklarli, E., Duran, M. S., & Üçler, Y. T. (2017) The Determinants of High-Technology Exports: A Panel Data Approach for Selected OECD Countries. *Dubrovnik International Economic Meeting*, 3(1), pp.888-900.

Kahai, S. K. (2011) Traditional and non-traditional determinants of foreign direct investment in developing countries. *Journal of Applied Business Research*, 20(1), pp.67-89.

Kandiero, T., & Chitiga, M. (2006) Trade openness and Foreign Direct Investment in Africa: economics. *South African Journal of Economic and Management Sciences*, 9(3), pp.355-370.

Kang, Y., & Jiang, F. (2012) FDI location choice of Chinese multinationals in East and Southeast Asia: Traditional economic factors and institutional perspective. *Journal of world business*, 47(1), pp.45-53.

Kapuria-Foreman Vibha (2007) Economic Freedom and Foreign Direct Investment in Developing Countries. *The Journal of Developing Areas*, 41(1), pp.143-154.

Karakaplan, U., Neyapti, B., & Sayek, S. (2005) Aid and foreign direct investment: International evidence. *Turkish Economic Association Working Paper No. 2005/12*.

Kaufmann, D., Kraay, A., & Mastruzzi, M. (2009) Governance matters VIII: aggregate and individual governance indicators. *World bank policy research working paper* 4978.

Khaliq, Abdul and Ilan Noy (2007) Foreign Direct Investment and Economic Growth: Empirical Evidence from Sectoral Data in Indonesia. *Journal of Economic Literature*, 45(1), pp.313-325.

Khan, R. E. A., and Hye, Q. M. A. (2014) Foreign Direct Investment and Liberalization Policies in Pakistan: An Eempirical Analysis. *Cogent Economics and Finance* 2(1), pp.1-12.

Khusanjanova, Jamola (2011) Enhancing FDI inflows into Oil and Gas Industry: Case Study of Selected Countries in the World. *International Conference on Environment and Bio-Science* vol.21.

KILIÇ, C., Bayar, Y., & Özekicioğlu, H. (2014) Araştırma Geliştirme Harcamalarının Yüksek Teknoloji Ürün İhracatı Üzerindeki Etkisi: G-8 Ülkeleri İçin Bir Panel Veri Analizi. *Erciyes Üniversitesi İktisadi ve İdari Bilimler Fakültesi Dergisi*, (44), pp.115-130.

Kinda, Tidiane, (2010) Investment Climate and FDI in Developing Countries: FirmLevel Evidence. *World Development* 38 (4), pp.498-513.

Kirca, A. H. (2011) The effects of market orientation on subsidiary performance: Empirical evidence from MNCs in Turkey. *Journal of World Business*, 46(4), pp.447-454.

Kirca, A. H., Hult, G. T. M., Roth, K., Cavusgil, S. T., Perry, M. Z., Akdeniz, M. B., & Miller, J. C. (2011) Firm-specific assets, multinationality, and financial performance: A meta-analytic review and theoretical integration. *Academy of management journal*, 54(1), pp.47-72.

Kisto, M., (2017) Determinants of Foreign Direct Investment In Mauritius: Evidence From Time Series Data. *Journal of international business studies*, 38(4), pp.481-498.

Kizilkaya, O., Ay, A., & Akar, G. (2016) Dynamic relationship among foreign direct investments, human capital, economic freedom and economic growth: Evidence from panel cointegration and panel causality analysis. *Theoretical & Applied Economics*, 23(3), pp.18-30.

Klein, M. W., & Rosengren, E. (1994) The real exchange rate and foreign direct investment in the United States: relative wealth vs. relative wage effects. *Journal of international Economics*, 36(3), pp.373-389.

Kneller, R. and Pisu, M., (2007) Industrial linkages and export spillovers from FDI. *The World Economy*, 30(1), pp.105-134.

Kogut, B., & Chang, S. J. (1991) Technological capabilities and Japanese foreign direct investment in the United States. *The Review of Economics and Statistics*, pp.401-413.

Kohpaiboon A (2006) Foreign Direct Investment and Technology Spillover: A Cross-Industry Analysis of Thai Manufacturing. *World Development*, 34 (3): pp.541-556.

Kok, R., & Acikgoz Ersoy, B. (2009) Analyses of FDI determinants in developing countries. *International Journal of Social Economics*, 36(1/2), pp.105-123.

Kokko A., Zejan M, and Tansini R (2001) Trade Regimes and Spillover Effects of FDI: Evidence from Uruguay. *Weltwirtschaftliches Archiv*, 137, pp.124-49.

Koojaroenprasit, S. (2012) The impact of foreign direct investment on economic growth: A case study of South Korea. *International Journal of Business and Social Science*, 3(21), pp.10-33.

Kottaridi, C. & Stengos, T. (2010) Foreign direct investment, human capital and nonlinearities in economic growth. *Journal of Macroeconomics*. 32, pp.858-871.

Kudina, A., & Jakubiak, M. (2012) *The Motives and Impediments to FDI in the CIS*. Berlin: Springer.

Kugler, M. (2006). Does Foreign Investment Facilitate Exports? Evidence from Venezuelan Manufacturing. *Theoretical & Applied Economics*, 23(3), pp.18-33.

Kumar, N., (1998) Multinational enterprises, regional economic integration, and export-platform production in the host countries: An empirical analysis for the US and Japanese corporations. *Review of World Economics*, 134(3), pp.450-483.

Kuntluru Sudershan K, Muppani Venkata R and Khan Mohammad A.A. (2012) Foreign Direct Investment and Export Performance of Pharmaceutical Firms in India: An Empirical Approach. International. *Journal of Economics and Finance*, 4(3), pp.67-89.

Kuntluru, S (2012) Foreign Direct Investment and Export Performance of Pharmaceutical Firms in India: An Empirical Approach, *International Journal of Economics and Finance*, 4(5), pp.216-243.

Kurtishi-Kastrati, S. (2013) Impact of FDI on economic growth: An overview of the main theories of FDI and empirical research. *European Scientific Journal*, 9(7), pp.55-79.

Kurtishi-Kastrati, S. (2013) The effects of foreign direct investments for host country's economy. *European Journal of Interdisciplinary Studies*, 5(1), pp. 26-49.

Kutan, A. M., Vuksic G. (2007) Foreign Direct Investment and Export Performance: Empirical Evidence. *Comparative Economic Studies*, 49(3), pp.430-445.

Kuzmina, O. Volchkova, N. and Zueva, T. (2014) Foreign direct investment and governance quality in Russia. *Journal of Comparative Economics*, 42(4), pp.874–891.

Kyereboah-Coleman, A., & Agyire-Tettey, K. F. (2008) Effect of exchange-rate volatility on foreign direct investment in Sub-Saharan Africa: The case of Ghana. *The Journal of Risk Finance*, 9(1), 52-70.

Kyophilavong, P., Shahbaz, M., Anwar, S. & Masood, S. (2015) The energy-growth nexus in Thailand: does trade openness boost up energy consumption? *Renewable and Sustainable Energy Reviews*. 46(2), pp.265-274.

Lahiri, S. and Ono, Y. (1998) Foreign direct investment, local content requirement, and profit taxation. *The Economic Journal*, 108(447), pp. 444-457.

Lall, P., Norman, D. W., & Featherstone, A. M. (2003) Determinants of US direct foreign investment in the Caribbean. *Applied Economics*, 35(13), pp.1485-1496.

Lawal, T., & Oluwatoyin, A. (2011) National development in Nigeria: Issues, challenges and prospects. *Journal of Public Administration and policy research*, 3(9), pp.237-241.

Le Billon, P. (2001) The political ecology of war: natural resources and armed conflicts. *Political geography*, 20(5), pp.561-584.

Lee, K., & Shields, K. (2011) Decision-Making in Hard Times: What is a Recession, Why Do We Care and How Do We Know When We Are in One. *The North American Journal of Economics and Finance*, pp.1-2.

Leitão, N. C. (2010) Foreign Direct Investment: The Canadian Experience *International Journal of Economics and Finance*, 2(4), pp.45-76.

Leitão, N.C., & Faustino, H.C. (2010) Determinants of Foreign Direct Investment in Portugal, *Journal of Applied Business and Economics* ,11(3), pp.21-48.

Li, Q. (2008) Foreign Direct Investment and Interstate Military Conflict. *Journal of International Affairs*, 62(1), pp.53-66.

Li, Q. (2009) Democracy, autocracy, and expropriation of foreign direct investment. *Comparative Political Studies*, 42(8), pp.1098-1127.

Li, Quan, and Adam Resnick. (2003) Reversal of Fortunes: Democratic Institutions and Foreign Direct Investment Inflows to Developing Countries. *International Organization*, 57(1), pp.175–211.

Li, Quan. (2009) Democracy, Autocracy, and Expropriation of Foreign Direct Investment. *Comparative Political Studies*, 42 (8), pp.1098–1127.

Li, X. and Liu, X. (2005) Foreign direct investment and economic growth: an increasingly endogenous relationship. *World Development*, 33(3), pp.393-407.

Liargovas, P. G., and Skandalis, K. S. (2012) Foreign Direct Investment and Trade Openness: The Case of Developing Economies. *Social Indicators Research* 106(2), pp.323–331.

Lily, J., Kogid, M., Mulok, D., Thien Sang, L., and Asid, R. (2014) Exchange Rate Movement and Foreign Direct Investment. *International Journal of Information, Business and Management*, 12(1), 2020-2056.

Lipsey, R. E. (2001) Foreign direct investors in three financial crises. *National Bureau of Economic Research Working Paper No. w8084*.

Littlejohn, S.W. & Foss, K.A. (2009) *Encyclopedia of Communication Theory*. London: SAGE Publication.

Liu, X.M.; Romilly, P; Song, H.Y. and Wei, Y.Q. (1997) Country characteristics and foreign direct investment in China: A panel data analysis. *Review of World Economics*, 133(2), pp.313-329.

Lucas, R. E., Jr. (1990) Why doesn't capital flow from rich to poor countries. *American Economic Review*, 80, pp.92–96.

Lunn, J. (1980) Determinants of US direct investment in the EEC: Further evidence. *European Economic Review*, 13(1), pp.93-101.

Luo, Y., & Tung, R. L. (2007) International expansion of emerging market enterprises: A springboard perspective. *Journal of international business studies*, 38(4), pp.481-498.

Luo, Y., & Wang, S. L. (2012) Foreign direct investment strategies by developing country multinationals: A diagnostic model for home country effects. *Global Strategy Journal*, 2(3), pp.244-261.

Madani, S., and Nobakht, M. (2014) Political Regimes and FDI Inflows: Empirical Evidence from Upper Middle Income Countries. *Journal of Finance and Economics* 2(3):75-82.

Magazzino, C., (2016) The relationship between real GDP, CO2 emissions, and energy use in the GCC countries: A time series approach. *Cogent Economics & Finance*, 4(1), pp.115-239.

Manelle, L., & Mohamed, A. (2012) The effectiveness of external financing sources on economic growth case of the developing countries of the MENA region. *International Journal of Economics*, 6(1), pp.131-158.

Maneschi, Andrea (1998) *Comparative Advantage in international Trade: A Historical perspective*. Cheltenham: Edward Elgar publishing.

Mateev, Miroslav, (2009) Determinants of Foreign Direct Investment in Central and Southeastern Europe: New Empirical Tests. *Oxford Journal*, 8(1), pp.133-149.

McCloud, N and SC Kumbhakar (2012) Institutions, foreign direct investment and growth: A hierarchical Bayesian approach. *Journal of the Royal Statistical Society*, 175(1), pp.83–105.

Mehrara, M. (2007) Energy consumption and economic growth: The case of oil exporting countries. *Energy Policy*, 35, pp.2939–2945.

Meier, G., (1995) *Leading Issues in Economic Development*. Oxford University Press: Oxford.

Mejia, J.F. (2011) *Export Diversification and Economic Growth: An Analysis of Colombia's Export Competitiveness*. London: Springer.

Melnyk, L., Kubatko, O. and Pysarenko, S. (2014) The impact of foreign direct investment on economic growth: case of post communism transition economies. *Problems and perspectives in Management*, 12(1), pp. 17-24.

Mencinger, J. (2003) Does foreign direct investment always enhance economic growth? *Kyklos*, 56(4), pp. 491-508.

Mhlanga, N.; Blalock, G.; Christy, R. (2010) Understanding foreign direct investment in the southern African development community: an analysis based on project-level data. *Agricultural Economics*, 41 (3-4), pp.337-347.

Miller, J.W and Atanda, T (2011) The Rise of Peri-Uban Aquaculture in Nigeria.” *International Journal of Agriculture Sustainability*, 1(7), pp.67-98.

Mina, W. (2007) The location determinants of FDI in the GCC countries. *Journal of Multinational Financial Management*, 17(4), pp.336-348.

Ministry of economic planning and budget (2010) *Facts and Figures on Ondo State*. Akure: department of research and statistics. *International Journal of Economics*, 6(1), pp.101-123.

Mohamed, S. E., & Sidiropoulos, M. G. (2010) Another look at the determinants of foreign direct investment in MENA countries: an empirical investigation. *Journal of Economic Development*, 35(2), pp.45-75.

Moosa, I. A., & Cardak, B. A. (2006) The determinants of foreign direct investment: An extreme bounds analysis. *Journal of Multinational Financial Management*, 16(2), pp.199-211.

Morck, R., Yeung, B., & Zhao, M. (2008) Perspectives on China's outward foreign direct investment. *Journal of International Business Studies*, 39(3), pp.337-350.

Morisset, Jacques (2000) Foreign Direct Investment in Africa: Policies Also matter. *Transnational Corporation*. 9(2), pp.107-125.

Moroz, S., Pirmatov, K., Horska, E., Nagyová, L., & Polakova, Z. (2017) The effect of selected economic indicators on export of goods of regions of Ukraine. *Montenegrin Journal of Economics*, 13(2), pp.141-150.

Moses, E. C. (2011) Oil and nonoil FDI and economic growth in Nigeria. *Journal of Emerging Trends in Economics and Management Sciences*, 2(4), pp.333-343.

Myers, M.D. (2008) *Qualitative Research in Business & Management*. SAGE Publications.

Narula, R. (2002) *Multinational investment and economic structure: Globalisation and competitiveness*. Berlin: Routledge.

Nguyen, H., Duysters, G., Patterson, J. and Sander, H. (2009) Foreign Direct Investment Absorptive Capacity Theory, *International Journal of Economics and Business Research*, 1(3), pp.317–332.

Nguyen, VB (2015) Effect of institutional quality on FDI in provinces of Vietnam: Empirical evidence based on difference panel GMM. *Journal of Economic Development*, 22(3), pp.26–45.

Nieman, M. D., and Thies, C. G. (2018) Property Rights Regimes, Technological Innovation, and Foreign Direct Investment. *Political Science Research and Methods* 12(1), pp.1-19.

Nigerian Investment Promotion Commission (2009) *Corporate Nigeria: The business, trade and Investment guide*. Abuja: NIPC.

Nigh, Douglas, (1986) Political Events and the Foreign Direct Investment Decision: An Empirical Examination. *Managerial and Decision Economics*, 7(2), pp.99-106.

Ning, Y., & Reed, M. R. (1995) Locational determinants of the US direct foreign investment in food and kindred products. *Agribusiness*, 11(1), pp.77-85.

Nishimura, Y. and K. Hirayama (2013) Does exchange rate volatility deter Japan–China trade? Evidence from pre- and post-exchange rate reform in China, *Japan and the World Economy*, 25(26), pp.90–101.

Noorbakhsh, F., Paloni, A., & Youssef, A. (1999) Low wages or skilled labour? Prospects for foreign direct investment in developing countries. *Department of Economics University of Glasgow Working Paper Series*, No. 58

Noorbakhsh, F., Paloni, A., & Youssef, A. (2001) Human capital and FDI inflows to developing countries: New empirical evidence. *World development*, 29(9), pp.1593-1610.

North, D. C. (1990) *Institutions, institutional change and economic performance*. Cambridge: University press.

Novikov, A.M. & Novikov, D.A. (2013) *Research Methodology: From Philosophy of Science to Research Design*. London: CRC Press.

Nzeka, U. M. (2012) *Export Guide*. Lagos: Global Agricultural Information Network.

Obwona, M. B. (2001) Determinants of FDI and their Impact on Economic Growth in Uganda. *African Development Review*, 13(1), pp.46-81.

Obwona, M. B. (2004) Foreign direct investment in Africa. In *Financing Pro-Poor Growth*. Paper presented at the AERC Senior Policy Seminar 2–4 March 2004.

Odularu, G. O. (2008) Crude oil and the Nigerian economic performance. *Oil and Gas Business*, 1(10), pp.1-29.

Ogbeidi, M.M. (2012) Political Leadership and Corruption in Nigeria Since 1960: A socio-economic Analysis. *Journal of Nigerian Studies*. 1(2), pp.23-63.

Ogochukwu, O.N (2016) The Oil Price Fall and the Impact on the Nigerian Economy: A Call for Diversification. *Journal of Law, Policy and Globalization*, 48(3), pp.33-67.

Ogujiuba, kanayo (2014) Poverty Indices and Reduction Strategies in Nigeria: Challenges of Meeting 2015 MDG Target. *Journal of Economics*, 5(2), pp. 201-217.

Okafor, G., Piesse, J. and Webster, A., (2015) The motives for inward FDI into Sub-Saharan African countries. *Journal of Policy Modelling*, 37(5), pp.875-890.

Okechi, J.K. (2004) *Profitability Assessment of African catfish (Clarias Gariepinus) Farming in the Lake Victoria Basin, Kenya*. PhD Thesis, University of Iceland.

- Oladipo, O.S., (2010) Foreign direct investment (FDI): determinants and growth effects in a small open economy. *The International Journal of Business and Finance Research*, 4(4), pp.75-88.
- Olaleye, S.O., Edun. F. and Taiwo, S.B. (2013) Economic Diversification and Economic Growth in Nigeria: An Empirical Test of Relationship using a Granger Casualty Test. *Journal of Emerging Trends in Economics and Management Sciences*, 5(1): pp. 70-79.
- Olanrewaju, A., & Orisasona, O. K. (2015) Cryopreservation: A Viable Tool for Sustainable Catfish Aquaculture Industry in Nigeria. *Journal of Fishries & Livestock Production*, 3, pp.1-2.
- Olayiwola, K. and Okodua, H., (2013) Foreign direct investment, non-oil exports, and economic growth in Nigeria: a causality analysis. *Asian Economic and financial review*, 3(11), p.1479.
- Olofsdotter, K. (1998) Foreign direct investment, country capabilities and economic growth. *Review of World Economics*, 134(3), pp. 534-547.
- Olumide, G. (2016) Catfish Farmers Urged to Export Produce. *AGRONIGERIA*, 2(9), pp. 1-4.
- Omotor, D.G. (2011) Nigeria and the Global Economic Crisis. *Ekon Misao Praksa Dek God Xx.Bri*, 5(2), pp.59-80.
- Omri, A., Daly, S., Rault, C. & Chaibi, A. (2015) Financial development, environmental quality, trade and economic growth: what causes what in MENA countries. *Energy Economics*. 48, pp.242-252.
- Onodugo, I.C., Amujiri, B.A and Nwuba, B.N. (2015) Diversification of the economy: A panacea for Nigerian economic development. *International Journal of Multidisciplinary Research and Development*, 7(1), 89-107.
- Onodugo, V.A., Ikpe, M. and Anowor, O.F. (2013) Non-Oil Export and Economic Growth in Nigeria: A Time Series Econometric Model. *International Journal of Business Management and Research*, 3(2), 67-99.
- Onyeiwu, S., & Shrestha, H. (2004) Determinants of foreign direct investment in Africa. *Journal of Developing Societies*, 20(1-2), pp.89-106.
- Osehobo, V. (2015) Nigeria Produces 9000 Metric Tonnes of Catfish says Association. *Nigerian Pilot*, 3(6), p. 1-33.

Otto, G. and Ukpere, W.I. (2014) Foreign direct investments and economic development and growth in Nigeria. *Mediterranean Journal of Social Sciences*, 5(2), pp. 713.

Oyejide, T.A. and Adewuyi, A.O., (2011) Enhancing linkages of oil and gas industry in the Nigerian economy. *MMCP Working Paper no.23*.

Oyinbo, O., Abraham F. and Rekwot, G.Z. (2014) Nexus of exchange rate deregulation and agricultural share of gross domestic product in Nigeria. *CBN Journal of Applied Statistics*, 5(2), pp.49-64.

Ozigbo, E., Anyadike, C., Adegbite, O. and Kolawole, P. (2014) Review of Aquaculture Production and Management in Nigeria. *American Journal of Experimental Agriculture* 4(10), pp.1137-1151.

Ozturk, I., & Acaravci, A. (2013) The long-run and causal analysis of energy, growth, openness and financial development on carbon emissions in Turkey. *Energy Economics*, 36, pp.262-267.

Pacheco-López, P. (2005) Foreign Direct Investment, Exports and Imports in Mexico, *The World Economy*, 28(8), pp. 1157-1172.

Padhan, P. Ch. (2007) The Nexus between Stock Market and Economic Activity: An Empirical Analysis for India. *International Journal of Social Economics*, 34(10), pp. 741 – 753.

Paul, J., Magee, L., Scerri, A. and Steger, M. (2015) *Urban Sustainability in Theory and Practice: Circles of sustainability*. London: Routledge.

Pekovic, S., Rolland, S. (2016) Quality Standards and Export Activities: Do Firm Size and Market Destination Matter. *Journal of High Technology Management Research*, 27(2), pp. 110–118.

Peng, M. W., Sun, S. L., Pinkham, B., & Chen, H. (2009) The institution-based view as a third leg for a strategy tripod. *Academy of Management Perspectives*, 23(3), pp.63-81.

Pistoresi, B. (2000) Investimenti diretti esteri e fattori di localizzazione: L'America Latina e il Sud Est asiatico. *Rivista di Politica Economica*, 90(2), pp.27-44.

Pollard, S.K., Shackman, J.D. and Piffaut, P.V. (2011) What does the Penn World Table 7.0 tell us about government expenditure and economic growth? *International Journal of Economics and Management Sciences*, 1(4), pp.98-111.

Pongsiri, Nutavoot (2005) Foreign Direct Investment and Regulation: a Case Study of Thailand's Upstream Oil and Gas Industry. *Special Feature: Asian Energy Law and Policy, OGEL working paper no.34*.

Popovici, O. C., & Cantemir, A. C. (2017) The Role of Foreign and Domestic Investment in Promoting Exports and Imports: A Dynamic Panel Approach. *J. Econ. Lit.* 36 (20): pp.14.

Porter, D., & Watts, M. (2017) Righting the resource curse: Institutional politics and state capabilities in Edo state, Nigeria. *The Journal of Development Studies*, 53(2), 249-263.

Prasanna, N. (2010) Impact of Foreign Direct Investment on Export Performance in India. *Journal of Social Science*, 24(1), 65-71.

Pulatova, M. (2016) Effects of Foreign Direct Investment and Firm Export in Economic Growth: Evidence from Uzbekistan. *European Journal of Business and Management*, 8(3), pp.20-46.

Quazi, R. M. (2007) Investment climate and foreign direct investment: a study of selected countries in Latin America. *Global Journal of Business Research*, 1(1), 1-13.

Quazi, Rahim M., (2007) Investment Climate and Foreign Direct Investment: A Study of Selected Countries in Latin America. *Global Journal of Business Research*, 1(2), 1-13.

Raheem, I. D. and Oyinlola, M. A. (2013) Foreign direct investment, governance and economic growth trilogy: New evidence from ECOWAS countries. *Journal of Global and Science Issues*, 1(2), 5– 14.

Ramamurti, R. (2009) The theoretical value of studying Indian multinationals. *Indian Journal of Industrial Relations*, 7(3), pp.101-114.

Ramanathan, R. (2008) *The Role of Organizational Change Management in Offshore Outsourcing of Information Technology Services*. London: Universal Publishers.

Ranjan, V., & Agrawal, G. (2011) FDI inflow determinants in BRIC countries: A panel data analysis. *International Business Research*, 4(4), pp.255-263.

Resmini, L. (2000) The determinants of foreign direct investment in the CEECs: new evidence from sectoral patterns. *Economics of transition*, 8(3), pp.665-689.

Rjoub, H., Aga, M., Abu Alrub, A., & Bein, M. (2017) Financial reforms and determinants of FDI: evidence from landlocked countries in Sub-Saharan Africa. *Economies*, 5(1), pp.1-25.

Romer, P.M. (1992) Two strategies for economic development: using ideas and producing ideas. *The World Bank Economic Review*, 6(1), pp. 63-91.

Root, F. R., & Ahmed, A. A. (1979) Empirical determinants of manufacturing direct foreign investment in developing countries. *Economic Development and Cultural Change*, 27(4), pp.751-767.

Ruane, F. and Ugur, A., (2004) Export platform FDI and dualistic development. *Academy of Management Perspectives*, 23(3), pp.63-81.

Rugman, A. M., & Verbeke, A. (2008) Internalization theory and its impact on the field of international business. In *International Business Scholarship: AIB Fellows on the First 50 Years and Beyond* (pp. 155-174). Emerald Group Publishing Limited.

Rugman, A.M. (1981) A test of internalization theory. *Managerial and Decision Economics*, 1(1), pp. 211-219.

Rugman, A.M. and Verbeke, A. (1992) A note on the transnational solution and the transaction cost theory of multinational strategic management. *Journal of International Business Studies*, 1(3), pp. 761-771.

Rugman, A.M. and Verbeke, A. (2001) Subsidiary-specific advantages in multinational enterprises. *Strategic Management Journal*, 22(3), pp.237-250.

Rugman, A.M. and Verbeke, A. (2003) Extending the theory of the multinational enterprise: internalization and strategic management perspectives. *Journal of International Business Studies*, 34(2), pp. 125-137.

Sachs, J.D. and Warner, A.M. (2001) The curse of natural resources. *European Economic Review*, 45(4), pp. 827-838.

Sala-i-Martin, X. and Subramanian, A. (2008) Addressing the natural resource curse: An illustration from Nigeria. *Journal of African Economies* 22.4 (2013), pp.570-615.

Sala-i-Martin, X.X. (1996) The classical approach to convergence analysis. *The economic journal*, 1(1), pp.1019-1036.

Salisu, Mohammed (2003) *Foreign Direct Investment in Sub-Saharan Africa*. PhD Thesis, Lancaster University.

Sanusi, L. S. (2010) Growth Prospects for the Nigerian economy. *Paper delivered at the Igbinedion University Eighth Convocation Ceremony. Okada, Edo State, Nov. 26.*

Saunders, M., & Thornhill, A. (2012) *Research Methods for Business Students*. 6th edition. India: Pearson Education Limited.

Scaperlanda, A. E., & Mauer, L. J. (1969) The determinants of US direct investment in the EEC. *The American Economic Review*, 59(4), pp.558-568.

Schmitz, A., & Bieri, J. (1972) EEC tariffs and US direct investment. *European Economic Review*, 3(3), pp.259-270.

Schneider, F., & Frey, B. S. (1985) Economic and political determinants of foreign direct investment. *World development*, 13(2), pp.161-175.

Scott, W. R. (2001) *Institution and organisation* (2nd ed.). London: Sage Publications.

Selaya, P., & Sunesen, E. R. (2012) Does foreign aid increase foreign direct investment?. *World Development*, 40(11), pp.2155-2176.

Selimi, N., Reçi, K., & Sadiku, L. (2016) The Impact of Foreign Direct Investment on the Export Performance: Empirical Evidence for Western Balkan Countries. *ILIRIA International Review*, 6(1), pp.89-111.

Sengupta, S, and Ntembe, A (2015) US foreign direct investments and economic growth in Sub-Saharan Africa: evidence from panel data, *Journal of Global and Science Issues*, 1(2), 5–14.

Sethi, D., Guisinger, S., Ford, D. L., & Phelan, S. E. (2002) Seeking greener pastures: A theoretical and empirical investigation into the changing trend of foreign direct investment flows in response to institutional and strategic factors. *International Business Review*, 11(1), 685–705.

Sghaier, I. M. – Abida, Z. (2013) Foreign Direct Investment, Financial Development and Economic Growth: Empirical Evidence from North African Countries. *Journal of International and Global Economic Studies*, 6(1), pp. 1 – 13.

Shah, M. H., and Samdani, S. (2015) Impact of Trade Liberalization on FDI Inflows to D-8 Countries. *Global Management Journal for Academic and Corporate Studies*, 5(1), pp.30-37.

Shahmoradi, B., & Baghbanyan, M. (2011) Determinants of foreign direct investment in developing countries: A panel data analysis. *Asian Economic and Financial Review*, 1(2), pp.49-70.

Sharma, R., Kaur, M. (2013) Causal Links between Foreign Direct Investments and Trade: A Comparative Study of India and China, *Eurasian Journal of Business and Economics*, 6 (11), 75-91.

Snieder, R. & Lerner, K. (2009) *The Art of Being a Scientist: A Guide for Graduate Students and their Mentors*. Cambridge: Cambridge University Press.

Söderlund, B., Tingvall, P. G. (2014) Dynamic Effects of Institutions on Firm-level Exports, *Review of World Economics*, 150(2), pp. 277–308.

Solomon, C., Islam, M.A. & Bakar, R. (2015) Attracting foreign direct investment: The case of Malaysia. *International Business Management*. 9(4), pp.349-357.

Solow, R.M. (1956) A contribution to the theory of economic growth. *The quarterly journal of economics*, 70(1), pp.65-94.

Sothan, S (2015) Foreign direct investment, exports, and long-run economic growth in Asia: panel cointegration and causality analysis. *International Journal of Economics and Finance*, 8(1), pp. 26-49.

Srholec, M. (2007) High-tech exports from developing countries: A symptom of technology spurts or statistical illusion?. *Review of world economics*, 143(2), pp.227-255.

Srivastava, S., & Talwar, S. (2020) Decrypting The Dependency Relationship Between The Triad Of Foreign Direct Investment, Economic Growth And Human Development. *The Journal of Developing Areas*, 54(2), pp.1-45.

Stephen, A. G. (2017) Econometric analysis of exchange rate and export performance in a developing economy. *Asian Economic and Financial Review*, 7(4), pp.334-368.

Stoian, C., & Filippaios, F. (2008) Dunning's eclectic paradigm: A holistic, yet context specific framework for analysing the determinants of outward FDI: Evidence from international Greek investments. *International Business Review*, 17(3), pp.349-367.

Sukhoruchenko, V. (2007) *Foreign Direct Investment in an Emerging Market: Implications for Policy-Making in Kazakhstan*. PhD Thesis, University of St.Gallen.

Sun H (2001) Foreign Direct Investment and Regional Export Performance in China. *Journal of Regional Science*, 41(1), pp.317-336.

Sun, Q., Tong, W. and Yu, Q. (2002) Determinants of foreign direct investment across China. *Journal of International Money and Finance*, 21(1), pp.79-113.

Suyanto, & Salim, R. (2011) Foreign direct investment spillovers and technical efficiency in the Indonesian pharmaceutical sector: firm level evidence. *Applied Economics*, 45(3), pp.383-395.

Swain, N.J. and Wang, Z. (1997) Determinants of inflow of foreign direct investment in Hungary and China: time-series approach. *Journal of International Development*, 9(5), pp.695-726.

Swenson, D. L. (1994) The impact of US tax reform on foreign direct investment in the United States. *Journal of Public Economics*, 54(2), pp.243-266.

Tang, S., Selvanathan, E.A. and Selvanathan, S. (2008) Foreign direct investment, domestic investment and economic growth in China: A time series analysis. *The World Economy*, 31(10), pp.1292-1309.

Tang, Y. & Zhang, K.H. (2015) Absorptive capacity and benefits from FDI: Evidence from Chinese manufactured exports, *International Review of Economics and Finance*, 1(2), pp.1-19.

Teece, D. J. (1986) Transactions cost economics and the multinational enterprise An Assessment. *Journal of Economic Behavior & Organization*, 7(1), 21-45.

Thomas, R. M. (2003) *Blending Qualitative and Quantitative research methods in theses and dissertations*. California: Corwin Press, Inc.

Trevino, L. J., Thomas, D. E., & Cullen, J. (2008) The three pillars of institutional theory and FDI in Latin America: An institutionalization process. *International Business Review*, 17(1), pp.118-133.

Tsai, P. L. (1994) Determinants of foreign direct investment and its impact on economic growth. *Journal of economic development*, 19(1), pp.137-163.

Tsang, E.W. (2005) Influences on foreign ownership level and entry mode choice in Vietnam. *International Business Review*, 14(4), pp. 441-463.

Udoh, E., & Egwaikhide, F. O. (2008) Exchange rate volatility, inflation uncertainty and foreign direct investment in Nigeria. *Botswana Journal of Economics*, 5(7), pp.14-31.

Umaru, A., Bello, M.S., and Salihu, M. (2013) An Empirical Analysis of Exchange Rate Volatility on Export Trade in Developing Economy. *Journal of Emerging Trends in Economics and Management Sciences*, 4(1): pp.42-53.

UNCTAD (1999) *World Investment Report: Foreign Direct Investment and the Challenge of Development*. United Nations, New York and Geneva.

UNCTAD (2002), *World Investment Report*. New York: United Nations.

UNCTAD (2001) *UNCTAD World Investment Report*, June 2001. Geneva: Switzerland.

UNCTAD (2003) *FDI Policies for development: National and International perspectives*. New York: United Nations.

UNCTAD (2007) *World Investment Report 2007: Transnational Corporations, Extractive Industries and Development*. New York: United Nations.

UNCTAD (2015) *Information Economy Report 2015: Unlocking the Potential of E-Commerce for Developing Countries*. New York and Geneva: United Nations.

UNCTAD (2016) *Foreign Direct Investment in Africa: Performance and Potential*. United Nations Publications: New York and Geneva: United Nations.

UNCTAD (2016) *UNCTAD World Investment Report*, June 2016. Geneva: Switzerland.

Uzawa, H. (1965) Optimum technical change in an aggregative model of economic growth. *International economic review*, 6(1), pp. 18-31.

Uzonwanne, M. C. (2015) Economic diversification in Nigeria in the face of dwindling oil revenue. *Journal of Economics and sustainable development*, 6(4), 61-67.

Vdovychenko, A., Zubritskiy, A. (2016) Fiscal Policy Effects on Commodity Exports in the Gravity Model of Ukraine's Foreign Trade. *Finance of Ukraine*, 6(1), pp. 51–71.

Vernon R. (1966) International investment and international trade in the product cycle. *Quarterly Journal of Economics*, 80 (2), pp.190-207.

Vijayakumar, N., Sridharan, P., & Rao, K. C. S. (2010) Determinants of FDI in BRICS Countries: A panel analysis. *International Journal of Business Science & Applied Management*, 5(3), pp.1-13.

Vijayakumar, N., Sridharan, P., & Rao, K. C. S. (2010) Determinants of FDI in BRICS Countries: A panel analysis. *International Journal of Business Science & Applied Management*, 5(3), pp70-98.

Villena-Manzanares, F., Souto-Pérez, J. E. (2016) Sustainability, Innovative Orientation and Export Performance of Manufacturing SMEs: An Empirical Analysis of the Mediating Role of Corporate Image. *Journal of Industrial Engineering and Management*, 9(1), pp. 35–58.

Vojtovič, S., Klimaviciene, A., & Pilinkiene, V. (2019). The linkages between economic growth and FDI in CEE countries. *Journal of Economics*, 67(3), pp34-68.

Voss, H., Buckley, P. J., & Cross, A. R. (2009) *An assessment of the effects of institutional change on Chinese outward direct investment activity*. London: Palgrave Macmillan.

Vuksic, G. (2006) Foreign Direct Investment and Export Performance of the Transition Countries in Central And Eastern Europe. *Paper for Presentation at the 12th Dubrovnik Economic Conference, organized by the Croatian National Bank*.

Vural, Y. I., Zortuk, M. (2011) Foreign Direct Investment as a Determining Factor in Turkey's Export Performance, *Eurasian Journal of Business and Economics*, 4(7), pp.13-23.

Wafure, O. G., & Nurudeen, A. (2010) Determinants of foreign direct investment in Nigeria: An empirical analysis. *Global journal of human social science*, 10(1), pp.26-34.

Wafure, O. G., & Nurudeen, A. (2010) Determinants of foreign direct investment in Nigeria: An empirical analysis. *Global Journal of Human-Social Science Research*, 10(1), pp.102-136.

Wagner, J. (2016) Quality of Firms' Exports and Distance to Destination Countries: First Evidence from Germany. *Open Economies Review*, 27(4), pp. 811–818.

Wahid, A. N., Sawkut, R., & Seetanah, B. (2009) Determinants of foreign direct investments (FDI): Lessons from the African economies. *The Journal of Applied Business and Economics*, 9(1), pp.70-98.

Walliman, N. S. & Walliman N. (2011) *Research methods: the basics*. London: Taylor and Francis.

Wang, C., Buckley, P. J., Clegg, J., Kafouros, M. (2007) The impact of inward foreign direct investment on the nature and intensity of Chinese manufacturing exports, *Transnational Corporations*, 16(2), 123-140.

Wei, S. J., & Shleifer, A. (2000) Local corruption and global capital flows. *Brookings Papers on Economic Activity*, (2), pp.303-346.

Wei, Y. and Liu, X. (2001) *Foreign Direct Investment in China: Determinants and Impact*. London: Edward Elgar.

Wernick, DA, J Haar and S Singh (2009) Do governing institutions affect foreign direct investment inflows? New evidence from emerging economies. *International Journal of Economics and Business Research*, 1(3), pp.317–332.

Wheeler, D., & Mody, A. (1992) International investment location decisions: The case of US firms. *Journal of international economics*, 33(1-2), pp.57-76.

Wignaraja, G. (2012) Innovation, learning, and exporting in China: Does R&D or a technology index matter?. *Journal of Asian Economics*, 23(3), pp.224-233.

Williamson, O.E. (1975) *Markets and Hierarchies: Analysis and Antitrust Implications*. New York: The Free Press.

Wilson, J. (2010) *Essentials of Business Research: A Guide to Doing Your Research Project*. Paris: SAGE Publications.

Wisniewski, T. P., and Pathan, S. K. (2014) Political Environment and Foreign Direct Investment: Evidence from OECD Countries. *European Journal of Political Economy* 36(1), pp.13-23.

Wooldridge, J. M. (2010) *Econometric analysis of cross section and panel data*. New York: MIT press.

World Bank (1996) *World Debt Tables: External Finance for Developing Countries*, Vol. 1. Washington, D.C. The World Bank.

World Bank, (1999) *World Development Report 1999: Knowledge for Development*. New York: Oxford University Press.

Yang, J.Y.Y., Groenewold, N. and Tcha, M. (2000) The determinants of foreign direct investment in Australia. *Economic Record*, 76(232), pp. 45-54.

Yang, K. (2010), *Making Sense of Statistical Methods in Social Research*. London: Sage Publications.

Yin, R.K. (2014) *Case Study Research: Design and Methods*. Los Angeles: Sage Publications.

Yiu, D., & Makino, S. (2002) The choice between joint venture and wholly owned subsidiary: An institutional perspective. *Organisation Science*, 13, pp.667–683.

Zakia, M., & Ziad, A. (2007) The Impact of foreign direct investment and imports on economic growth: The Case of Jordan. *Journal of Economic and Administrative Sciences*, 23(1), pp.1-31.

Zaman, Q., Donghui, Z., Yasin, G., Zaman, S., and Imran, M. (2018) Trade Openness and FDI Inflows: A Comparative Study of Asian Countries. *European Online Journal of Natural and Social Sciences*, 7(2), pp.386–396.

Zhan, J.X. (1995) Transnationalization and outward investment: the case of Chinese firms. *Transnational Corporations*, 4(2), pp. 67-100.

Zhang K.H (2005) How does FDI Affect a Host Country's Export Performance? The case of China. *Paper presented in International conference of WTO, China, and the Asian Economies, III. In Xi'an, China, June 25-26.*

Zhang K.H and Song S (2001) Promoting Exports: The Role of Inward FDI in China. *China Economic Review*, 11(4), pp.385-406.

Zhang KH, (2005) How Does FDI Affect a Host Country's Export performance? The case of China. *Paper presented in International Conference of WTO, China and Asian Economies, III. In Xi'an, China, June 25-26, 2005.*

Zhang, K. H., & Markusen, J. R. (1999) Vertical multinationals and host-country characteristics. *Journal of Development Economics*, 59(2), pp.233-252.

Zhang, K.H. (2000) Why is U.S. Direct Investment in China so Small? *Contemporary Economic Policy*, 18(1), pp. 82-94.

Zhang, K.H. (2001) Does foreign direct investment promote economic growth? Evidence from East Asia and Latin America. *Contemporary Economic Policy*. 19(2). pp.175-185.

Zhang, X.H. and Yuk, H.P. (2000) Determinants of Hong Kong manufacturing investment in China: a survey. *Marketing Intelligence & Planning*, 16(4), pp260-267.

Zhang, Y. (2003) *China's emerging global businesses*. Hampshire: Palgrave Macmillan.

Zhao, John (2003) The Impact of Corruption and Transparency on Foreign Direct Investment: An Empirical Analysis. *Management International Review*, 43(1), pp.41-62.

Zheng, P. (2009) A comparison of FDI determinants in China and India. *Thunderbird International Business Review*, 51(3), pp.263-279.

Table 1a: Nigeria's Share of FDI stock and inflows to Africa and West-Africa Sub-region

	FDI Stock	% share in Africa	% share in Sub-Region (West Africa)	FDI Inflows	% share in Africa	% share in Sub-Region (West Africa)
1970	..	..	..	205	16.18%	53.21%
1971	..	..	..	286	34.02%	88.94%
1972	..	..	..	305	33.20%	78.56%
1973	..	..	..	373	48.81%	67.92%
1974	..	..	..	257	14.14%	73.14%
1975	..	..	..	470.12	51.88%	64.07%
1976	..	..	..	339	20.19%	65.52%
1977	..	..	..	440.514	56.40%	61.62%
1978	..	..	..	210.933	26.89%	34.58%
1979	..	..	..	309.599	20.87%	49.15%
1980	2457.296	5.98%	49.41%	-738.87	-184.55%	170.09%
1981	2999.623	7.31%	50.67%	542.327	27.77%	57.28%
1982	3430.234	8.03%	50.27%	430.611	20.76%	47.71%
1983	3794.669	8.86%	52.32%	364.435	27.55%	84.83%
1984	3983.834	9.72%	52.77%	189.165	10.04%	63.66%
1985	4469.415	10.41%	55.72%	485.581	19.88%	102.97%
1986	4662.63	10.24%	57.14%	193.215	10.91%	139.04%
1987	5273.182	10.61%	58.75%	610.552	24.99%	74.92%
1988	5651.849	11.34%	58.09%	378.667	12.49%	50.20%
1989	7536.099	13.73%	60.49%	1884.25	40.15%	69.02%
1990	8538.599	14.07%	60.94%	1002.5	35.24%	64.53%
1991	9662.499	14.83%	62.85%	1123.9	31.78%	82.21%
1992	10819.2	15.67%	64.54%	1156.7	30.43%	82.54%
1993	12697.3	17.30%	67.24%	1878.1	34.50%	88.52%
1994	14984.7	18.35%	69.15%	2287.4	37.47%	82.06%
1995	16255.75	18.20%	69.11%	1271.0534	22.48%	68.31%
1996	18446.44	20.09%	70.60%	2190.6847	36.28%	83.77%
1997	20088.91	19.72%	69.74%	1642.4722	14.89%	60.43%

1998	21299.01	19.30%	71.05%	1210.1053	10.41%	48.27%
1999	22476.72	14.60%	73.00%	1177.7079	9.95%	50.37%
2000	23786.39	15.50%	72.06%	1309.6652	13.57%	61.46%
2001	25063.81	16.19%	72.39%	1277.4206	6.40%	61.56%
2002	27103.99	15.84%	71.11%	2040.1821	13.84%	70.03%
2003	29275.38	13.54%	69.45%	2171.3903	11.91%	64.55%
2004	31402.47	12.05%	68.13%	2127.0861	11.99%	57.97%
2005	26345	9.32%	62.82%	4978.26	16.80%	69.55%
2006	31242.81	9.31%	63.12%	4897.81	14.16%	69.41%
2007	37329.54	9.00%	62.59%	6086.73	12.10%	63.76%
2008	45578.18	11.20%	65.65%	8248.64	14.29%	66.39%
2009	54227.71	10.58%	64.10%	8649.53	15.96%	58.74%
2010	60326.67	10.15%	63.67%	6098.96	14.00%	50.79%
2011	69241.56	11.44%	61.42%	8914.89	18.66%	47.03%
2012	76368.94	11.67%	58.77%	7127.39	12.92%	42.24%
2013	81977.41	11.94%	57.51%	5608.45	10.75%	38.70%
2014	86671.23	12.16%	57.29%	4693.83	8.05%	38.74%
2015	89735.4	12.12%	56.60%	3064.17	5.67%	30.97%
2016	94184	11.66%	57.31%	4449	8.36%	35.81%
2017	97687	11.27%	54.51%	3503	8.39%	31.91%
Average		12.72%	62.17%		16.95%	65.98%

Source: By the author with figures from UNCTAD

Table 1b: Top Ten Traded Items in Nigeria (Export) 2015

S/N	Item	Value	Item Category
1	Petroleum oils and oils obtained from bituminous minerals, crude	₦ 6,809,540,283,380.67	Petroleum oils & oils obtained from bituminous minerals, crude
2	Natural gas, liquefied	₦ 1,058,288,192,884.70	Petroleum gases and other gaseous hydrocarbons
3	Propane, liquefied	₦ 277,439,764,600.90	Petroleum gases and other gaseous hydrocarbons
4	Other Light vessels, fire-floats, floating cranes, etc,	₦ 263,504,431,221.00	Light-vessel, fire-floats, etc; floating docks, drilling platforms
5	Partially refined oil including crude oil having undergone primary refinement	₦ 142,070,076,104.00	Petroleum oils, etc, (excl. crude); preparations thereof, nes
6	Vessels and other floating structures for breaking up	₦ 124,330,061,819.00	Vessels and other floating structures for breaking up
7	Other ships and similar vessels for the transport of goods	₦ 107,412,559,024.00	Ships, boats and floating structures
8	Helicopters of an unladen weight exceeding 2000kg	₦ 71,658,722,611.00	Other aircraft (eg helicopters, aeroplanes); spacecraft, etc
9	Sesamum seeds, whether or not broken	₦ 69,288,372,631.00	Other oil seeds and oleaginous fruits
10	Butanes, liquefied	₦ 55,221,150,408.80	Petroleum gases and other gaseous hydrocarbons

Table 1c: Top Ten Traded Items in Nigeria (Export) 2016

S/N	Item	Value	Item category
1	Petroleum oils and oils obtained from bituminous minerals, crude	₦ 6,996,574,195,166.87	Petroleum oils & oils obtained from bituminous minerals, crude
2	Natural gas, liquefied	₦ 997,562,328,787.19	Petroleum gases and other gaseous hydrocarbons
3	Other petroleum gases etc in gaseous state	₦ 77,927,529,336.27	Petroleum gases and other gaseous hydrocarbons
4	Good fermented Nigerian cocoa beans - main crop 2015/2016	₦ 59,280,162,119.73	Cocoa beans, whole or broken, raw or roasted
5	Propane, liquefied	₦ 39,195,428,085.63	Petroleum gases and other gaseous hydrocarbons
6	Other Liquefied petroleum gases and other gaseous hydrocarbons	₦ 32,179,021,229.10	Petroleum gases and other gaseous hydrocarbons
7	Cigarettes containing tobacco	₦ 31,080,783,737.83	Cigars, cigarillos, cigarettes, etc, of tobacco/tobacco subst.
8	Butanes, liquefied	₦ 30,646,440,335.31	Petroleum gases and other gaseous hydrocarbons
9	Electrical energy (optional heading)	₦ 29,311,808,770.21	Electrical energy
10	Sesame seeds, whether or not broken	₦ 25,546,738,870.55	Other oil seeds and oleaginous fruits

Table 2: FDI inflows in Nigeria, by countries of origin, 1990-2004

(Millions of dollars)

Regional/economy	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
France	- 85.4	- 25.3	- 24.9	315.7	- 16.2	- 80.7	- 71.4	- 95.1			120.4	47.9	340.0		
Germany	- 24.2	57.7	18.8	17.7	- 6.0	28.7	171.6	195.1	104.5			74.3	7.5 6.8	6.8	-1 05.5
Netherlands	4.8	21.2	12.5	34.4	48.4	78.2	386.9	334.3	23.3	- 592.4	59.9	583.4	467.7	317.1	
Switzerland				4.1	10.1	- 2.0	0.6	- 6.1	3.5	- 4.3	2.1	5.0	0.6	19.2	
United Kingdom	- 21.3	400.3	242.2	520.4	- 301.5	- 427.7	- 146.7	383.1	-240.1	258.9	86.2	106.5	329.7	27.8	
United States	- 423	887	- 271	187	119 61	61	407	375	403	- 524	137	- 192	588	179	- 152

Source: CBN, UNCTAD.

Table 3: FDI stock in Nigeria, by countries of origin, 1990-2004 (Millions of dollars)

Regional/economy	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
France	217	132	195						257						
Germany	102	138	63	64	67	45	53	78	78	182	247	263	203	241	
Netherlands	44	79	90	193	276	357	998	1 569	1 744	1 341	1 796	2 248	2 910	3 099	
Switzerland				27	42	37	31	31	19	22	9	19	19	33	
United Kingdom	627	784	741	1 117	1 064	519	545	1 753	770	821	1 352	1 514	1 631	1 835	
United States	401	529	301	478	605	629	1 020	1 396	1 686	233	470	260	901	1 080	955

Source: CBN, UNCTAD.

Table 4: FDI Inflow % of GDP across other Countries

year	2017
Netherlands	38.31
Hong Kong SAR, China	35.85
Switzerland	5.58
Brazil	3.44
Australia	3.41
United Kingdom	2.47
Romania	2.34
Mauritius	2.19
Germany	2.12
France	1.83
United States	1.83
Russian Federation	1.82
Canada	1.67
India	1.54
China	1.37
Korea, Rep.	1.11
Italy	1.03
Nigeria	0.93
Norway	0.15

Source: World Bank

Table 5: Nigeria's Export

	2011	2012	2013	2014	2015
Values of exports (m \$)	99,878	96,905	97,818	82,586	45,365
values of petroleum exports (m \$)	88,449	95,131	89,930	77,489	41,818
% share of petroleum exports to total export	89%	98%	92%	94%	92%

Source: World Bank

Table 6: Access to Electricity and Mobile Cellular Subscriptions

	Access to electricity (% of population)	Access to electricity (% of population)	Mobile cellular subscriptions (per 100 people)	Mobile cellular subscriptions (per 100 people)
	2015	2016	2015	2016
China	100.00	100.00	92.48	97.25
India	88.00	84.53	76.47	85.17
Nigeria	52.50	59.30	83.28	82.98
United Kingdom	100.00	100.00	121.18	119.98
United States	100.00	100.00	119.49	122.88

Source: World Bank

Table 7: Control of Corruption and Rule of Law

	Control of Corruption: Percentile Rank	Control of Corruption: Percentile Rank	Rule of Law: Percentile Rank	Rule of Law: Percentile Rank
	2015	2016	2015	2016
China	48.55769	49.03846	39.90385	41.34615
India	44.71154	47.59615	55.76923	53.36538
Nigeria	12.5	13.46154	15.86539	15.38461
United Kingdom	93.75	94.23077	93.75	92.78846
United States	89.90385	89.90385	90.38461	91.34615
Ghana	52.88462	51.92308	60.57692	55.76923

Source: World Bank

Table 8: List of Home Countries Investing Used

Total	OECD	Non-OECD
Australia	Australia	Brazil
Brazil	Canada	China
Canada	France	India
China	Germany	Mauritius
France	Hong Kong	Romania
Germany	Italy	Russia
Hong Kong	Netherlands	
India	Norway	
Italy	South Korea	
Mauritius	Switzerland	
Netherlands	UK	
Norway	United States	
Romania		
Russia		
South Korea		
Switzerland		
UK		
United States		

Table 9: Study Variables

VARIABLE	PROXY	SIGN	DATA SOURCE	Model
FDI In Oil and Gas	FDI capital expenditure by oil and gas MNEs in Nigeria (Host/Home)		CBN, NBS, FT	Dependent Variable
Market Seeking FDI	GDP per capita (Host/Home)	+	CBN, NBS	Predictive Variable
Resource Seeking FDI	Fuel export. (Host/Home)	+/-	CBN, NBS	Predictive Variable
Efficiency Seeking FDI	Labour force (Host/Home)	+	CBN, NBS	Predictive Variable
Trade	Sum of export and import (Host/Home)	+	CBN, NBS	Control Variable
Policy Liberalisation	Interest Rate (Host/Home)	+/-	CBN, NBS	Control Variable
Infrastructure	Mobile Cellular Subscriptions (Host/Home)	+	CBN, NBS	Control Variable
Institutional/Political Factors	The rule of law (Host/Home)	-/+	International country risk guide	Control Variable
Financial Crisis	Dummy variable 0=before financial crisis 1=after financial crisis			

Table 10: Pearson Correlation Results.

	InFDI	lngdppc	lnfuelexport	lnlaborforce	Intrade	Inruleooflaw	Inmobsub	lninrate	FinCrisis
InFDI	1.0000								
lngdppc	0.0141 0.806	1.0000							
lnfuelexport	0.0027 0.963	-0.1127** 0.049	1.0000						
lnlaborforce	-0.1524*** 0.0076	-0.0757 0.1869	0.0245 0.6700	1.0000					
Intrade	0.2697*** 0.0000	-0.0590 0.3037	0.1050* 0.0667	-0.7133*** 0.0000	1.0000				
Inruleooflaw	-0.0737 0.1984	-0.3779*** 0.0000	-0.0102 0.8589	0.0651 0.2565	-0.0245 0.6695	1.0000			
Inmobsub	0.2538*** 0.0000	-0.1284** 0.0247	0.1991*** 0.0005	0.1072 0.0610	0.1051* 0.0664	0.0411 0.4735	1.0000		
lninrate	-0.1854*** 0.0056	-0.2610*** 0.0001	0.1343* 0.0456	-0.2122*** 0.0015	0.1980*** 0.0030	0.1047 0.1197	-0.1882*** 0.0049	1.0000	
FinCrisis	-0.0559 0.3298	-0.1653*** 0.0037	0.0261 0.6491	-0.0431 0.4530	-0.0142 0.8046	0.0636 0.2674	-0.4400*** 0.0000	0.0883 0.1900	1.0000

Levels of significance; * = 10%; **
= 5%; *** = 1%

Table 11: Variance Inflation Factor (VIF)

Variable	VIF	1/VIF
lntrade	2.82	0.354835
lnlaborforce	2.40	0.416962
lnmobsub	1.80	0.554847
lngdppc		1.51 0.660570
FinCrisis	1.41	0.711184
inruleooflaw	1.26	0.792596
lnintrate	1.24	0.805964
lnfuelexport	1.16	0.862391
Mean VIF	3.31	

Table 12: Empirical Results on the Determinants of OGFDI

	As a whole	OECD	non-OECD
InGDP per capita	0.0245* 0.050	0.3369* 0.065	0.0083* 0.075
InLabourForce	0.1149*** 0.002	0.2095*** 0.000	0.0887* 0.063
InFuel Export	0.0341* 0.096	0.1736* 0.061	0.2915*** 0.000
InTrade	0.1201*** 0.000	0.1556*** 0.000	0.1667*** 0.000
InRule of Law	-0.0715 0.197	-0.0033 0.958	-0.1369* 0.092
Inmobile Sub.	0.0553** 0.048	0.9607** 0.020	0.3791*** 0.000
InInt. Rate	-0.1891*** 0.004	-0.3367*** 0.000	-0.4296 0.000
InFDI lag 1	0.7035*** 0.000	0.7364*** 0.000	0.8062*** 0.000
FinCrisis	-0.0823 0.652	-0.1150 0.590	-0.2687 0.208
Wald chi2 Prob > chi2	229.41 0.000	654.42 0.000	
No. of obs.	288	192	96
No. of groups	18	12	6
Sargan Test Prob > chi2	210.7800 0.2570	87.7175 0.6630	118.3200 0.4140
AR-1 Prob > z	-1.4393 0.150	-1.5006 0.168	1.0459 0.217
AR-2 Prob> z	-1.1054 0.269	2.0340 0.101	4.1076 0.728

Levels of significance; * = 10%; ** = 5%; *** = 1%

Table 13: Table of variables

VARIABLE	PROXY	SIGN	DATA SOURCE	Model
FDI	Oil and gas FDI Inflows (Host/Home)	+	CBN, NBS, FT	Dependent variable
Human capital	. Labour Force (Host/Home)	+	World Bank's World Development Indicators	Predictive Variable
Trade	Sum of export and import (Host/Home)	+	CBN, NBS	Predictive Variable
Institutional quality	The rule of law (Host/Home)	-	NBS	Predictive Variable
Infrastructure	Mobile Subscription (Host/Home)	+	NBS	Predictive Variable
Policy Liberalisation	Interest Rate (Host/Home)	-/+	World Bank's World Development Indicators	Control Variable
Technological transfer	The ratio of oil and gas FDI inflows to GDP (Host/Home)	+	World Bank's World Development Indicators	Control Variable
Financial Crisis	Dummy variable 0=before financial crisis 1=after financial crisis			

Table 14: Pearson Correlation Results.

	Ingdppc	InFDI	lnlaborforce	lnTech	Intrade	Inruleooflaw	lnmobsub	lnintrate	FinCrisis
Ingdppc	1								
InFDI	-0.0107 0.8796	1							
lnlaborforce	0.0016 0.9823	-0.0313 0.6565	1						
lnTech	0.078 0.2677	0.0422 0.5492	-0.2153*** 0.002	1					
Intrade	0.0968 0.1683	- 0.3465*** 0.0000	-0.6829*** 0.0000	-0.1351* 0.054	1				
Inruleooflaw	- 0.2242*** 0.0013	-0.034 0.6293	0.1596** 0.0226	0.0002 0.9983	-0.1701** 0.015	1			
lnmobsub	0.1855*** 0.0079	0.2374*** 0.0006	-0.1299* 0.0641	- 0.4176*** 0.0000	0.111 0.1139	-0.0475 0.5001	1		
lnintrate	-0.1428* 0.0823	- 0.3998*** 0.0000	-0.2571*** 0.0016	0.3145*** 0.0001	0.0012 0.9887	0.1054 0.2009	-0.3041*** 0.0002	1	
FinCrisis	- 0.2512*** 0.0003	-0.0529 0.4525	-0.0168 0.811	0.1551** 0.0267	0.0455 0.5181	0.0509 0.4694	-0.5673*** 0.0000	0.0811 0.3254	1

Levels of significance; * = 10%; ** = 5%; *** = 1%

Table 15: Variance Inflation Factor (VIF)

Variable	VIF	1/VIF
lnlaborforce	2.82	0.354835
Intrade	2.40	0.416962
lnmobsub	2.19	0.456434
FinCrisis	1.64	0.609960
lnintrate	1.36	0.737264
lngdppc		1.29 0.772643
Inruleooflaw	1.19	0.839503
lnTech	1.78	0.561501
Mean VIF	1.83	

Table 16: Empirical Result of OGFDI Impact on Nigeria Economic Growth

	As a whole	OECD	non-OECD
InFDI	0.0427* 0.065	0.6711* 0.055	0.0153** 0.014
InLabourForce	0.2362*** 0.004	0.3828** 0.024	0.0561*** 0.008
InInt. Rate	-0.0897*** 0.000	-0.4369 0.1220	-0.7002 0.183
InRule of Law	-0.1065*** 0.000	-0.0999*** 0.016	-0.2031*** 0.004
Inmobile Sub.	0.0414*** 0.009	0.8800** 0.031	2.7993** 0.042
InTrade	0.0233** 0.011	0.6967** 0.041	1.0567** 0.022
InTech	0.0082 0.454	0.3030 0.540	0.2504* 0.088
lnGDP lag 1	0.1142*** 0.000	0.2452*** 0.000	0.2364*** 0.000
FinCrisis	-0.2025 0.791	-0.0275 0.190	-0.0145 0.768
Wald chi2	229.41	654.42	179.43
Prob > chi2	0.000	0.000	0.000
No. of obs.	288	192	96
No. of groups	18	12	6
Sargan Test	648.41	685.32	722.23
Prob > chi2	0.572	0.324	0.767
AR-1	3.4694	-1.5406	-6.5506
Prob > z	0.412	0.487	0.562
AR-2	10.3874	9.3650	8.3426
Prob> z	0.616	0.654	0.692

Levels of significance; * = 10%; ** = 5%; *** = 1%

Table 17: Data Description

VARIABLE	PROXY	SIGN	DATA SOURCE	Model
	Oil and gas Export	Dependent Variable	CBN, NBS, FT	Dependent variable
Inward oil and gas FDI	FDI (oil and gas FDI) (Host/Home)	+		Predictive variable
Human Capital	Labour Force (Host/Home)	+	CBN, NBS	Predictive variable
Trade	Trade openness (Sum of export and import) (Host/Home)	+	CBN, NBS	Predictive variable
Infrastructure	Infrastructure (mobile phone subscription) (Host/Home)	+	CBN, NBS	Predictive variable
Political stability	Institutional/Political factors (rule of law) (Host/Home)	-	CBN, NBS	Control variable
Policy liberalisation	Exchange rate (Host/Home)	-	CBN, NBS	Control variable
Financial Crisis	Dummy variable 0=before financial crisis 1=after financial crisis			

Table 18: Pearson Correlation Results.

	lnfdi	lnlaborforce	Intrade	Inruleooflaw	lnmobsub	lnexchrates	FinCrisis
lnfdi	1						
lnlaborforce	-0.0313 0.6565	1					
Intrade	- 0.3465*** 0.000	-0.6829*** 0.000	1				
Inruleooflaw	-0.034 0.6293	0.1596** 0.0226	-0.1701** 0.015	1			
lnmobsub	0.2374*** 0.0006	-0.1299* 0.0641	0.111 0.1139	-0.0475 0.5001	1		
lnexchrates	0.0999 0.156	-0.2196*** 0.0016	0.2024*** 0.0038	-0.1406** 0.0454	0.2873*** 0.0000	1	
FinCrisis	-0.0529 0.4525	-0.0168 0.811	0.0455 0.5181	0.0509 0.4694	-0.5673*** 0.0000	-0.1426* 0.0424	1

Levels of significance; * = 10%; ** = 5%; *** = 1%

Table 19: Variance Inflation Factor (VIF)

Variable	VIF	1/VIF
trade	1.91	0.524441
lnlaborforce	1.91	0.524555
lnmobsub	1.6	0.626096
FinCrisis	1.5	0.666626
lnexchrte	1.15	0.869911
inruleooflaw	1.05	0.955217
Mean VIF	1.52	

Table 20: Empirical Result of OGFDI Impact on export performance in Nigeria

	As a whole	OECD	non-OECD
InFDI	0.0987** 0.029	1.8095** 0.044	2.6649* 0.058
InLabourForce	0.2243*** 0.000	0.1839*** 0.000	0.0937*** 0.000
Inmobile Sub.	0.1414* 0.078	0.0668** 0.025	0.0595* 0.056
InRule of Law	-0.4799 0.581	-0.4283 0.184	-0.2025 0.162
InTrade	0.1624*** 0.000	1.7458*** 0.000	2.5375*** 0.000
InExRate	-0.2358** 0.028	-0.6724** 0.040	-0.3907* 0.056
InFuelExport lag 1	0.9874*** 0.000	0.9541*** 0.000	0.9841*** 0.000
FinCrisis	-0.3898 0.174	-1.5184 0.197	-2.0827 0.394
Wald chi2 Prob > chi2	741.35 0.000	784.61 0.000	654.32 0.000
No. of obs.	288	192	96
No. of groups	18	12	6
Sargan Test Prob > chi2	732.33 0.412	236.41 0.345	741.87 0.750
AR-1 Prob > z	6.2494 0.123	4.4506 0.774	5.2506 0.425
AR-2 Prob> z	1.4740 0.141	1.1705 0.674	2.7426 0.120

Levels of significance; * = 10%; ** = 5%; *** = 1%

Table 21: Summary of findings for FDI determinants

Determinants of FDI	Expected sign	Observed sign	OECD	Non-OECD
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		Full sample of home countries		
Market Seeking FDI	+	Positive & Significant	Positive & Significant	Positive & Significant
Resource Seeking FDI	+/-	Positive & Significant	Positive & Significant	Positive & Significant
Efficiency Seeking FDI	+/-	Positive & Significant	Positive & Significant	Positive & Significant
Trade	+	Positive & Significant	Positive & Significant	Positive & Significant
Policy Liberalisation	+/-	Negative & Significant	Negative & Significant	Negative & insignificant
Infrastructure	+	Positive & Significant	Positive & Significant	Positive & Significant
Institutional/Political Factors	-/+	Negative & insignificant	Negative & insignificant	Negative & Significant
Financial Crisis	-	Negative & insignificant	Negative & insignificant	Negative & insignificant

Table 22: Summary of findings for Impact on Economic growth

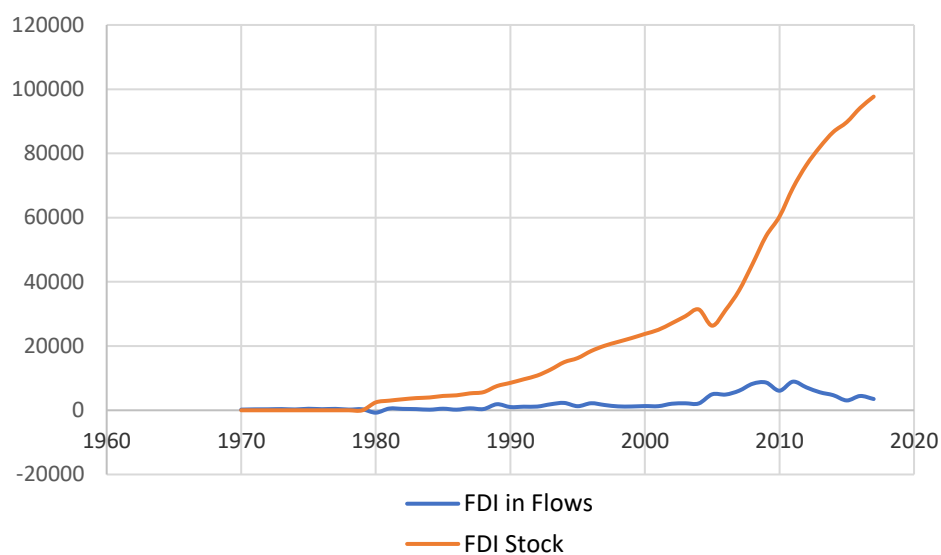
Impact on economic growth	Expected sign	Observed sign Full sample of home countries	OECD	Non-OECD
FDI	+	Positive & Significant	Positive & Significant	Positive & Significant
Human capital	+	Positive & Significant	Positive & Significant	Positive & Significant

Trade	+	Positive & Significant	Positive & Significant	Positive & Significant
Institutional quality	-	Negative & Significant	Negative & Significant	Negative & Significant
Infrastructure	+	Positive & Significant	Positive & Significant	Positive & Significant
Policy Liberalisation	-/+	Negative & Significant	Negative & Insignificant	Negative & Insignificant
Technological transfer	+	Positive & Insignificant	Positive & Insignificant	Positive & Significant
Financial crisis	-	Negative & insignificant	Negative & insignificant	Negative & insignificant

Table 22: Summary of findings for Impact on Export

Impact on export	Expected sign	Observed sign Full sample of home countries	OECD	Non-OECD
Inward oil and gas FDI	+	Positive & Significant	Positive & Significant	Positive & Significant
Human Capital	+	Positive & Significant	Positive & Significant	Positive & Significant
Trade	+	Positive & Significant	Positive & Significant	Positive & Significant
Infrastructure	+	Positive & Significant	Positive & Significant	Positive & Significant
Political stability	-	Positive & Insignificant	Positive & Insignificant	Positive & Insignificant
Policy liberalisation	-	Negative & Significant	Negative & Significant	Negative & Significant
Financial crisis	-	Negative & insignificant	Negative & insignificant	Negative & insignificant

Figure 1: FDI Stock vs. FDI Inflows in Nigeria



Source: Plotted by author with figures from UNCTAD

Figure 2: FDI Inflow as a % of GDP

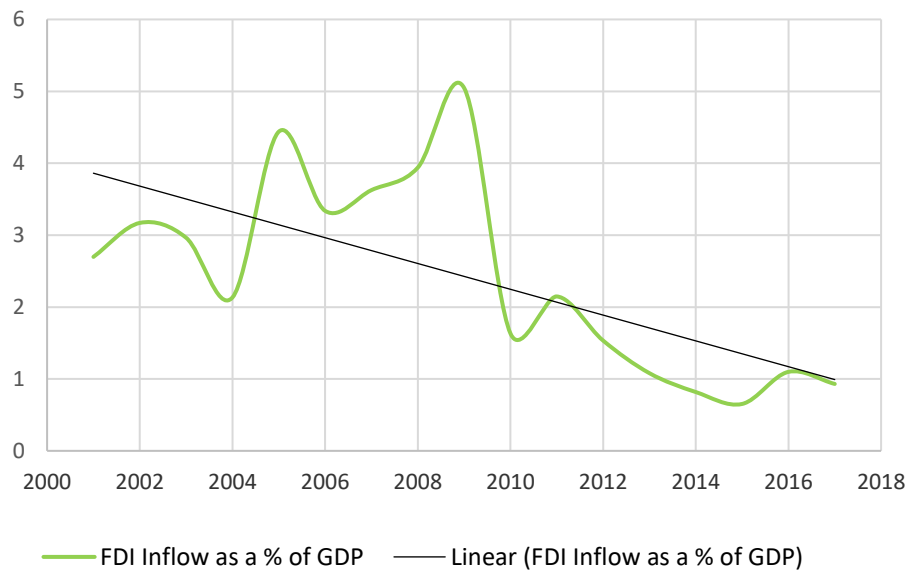
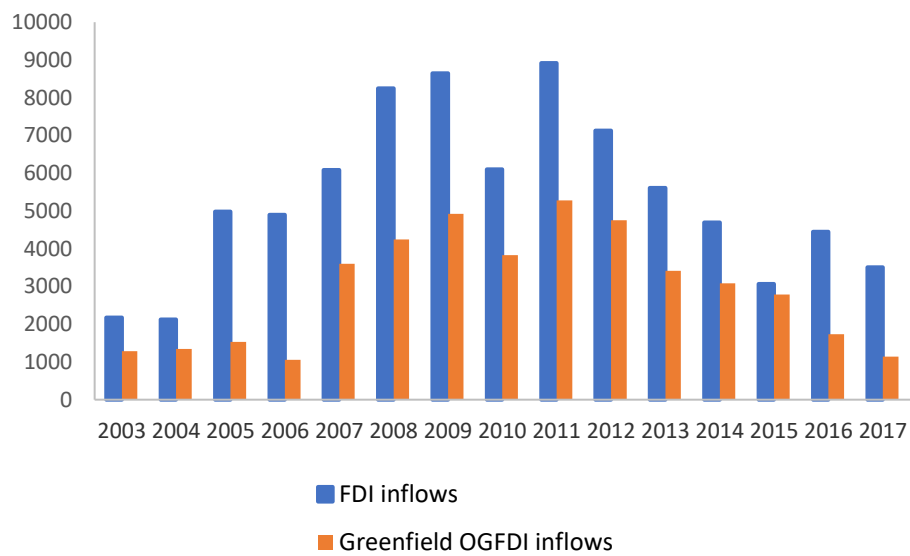
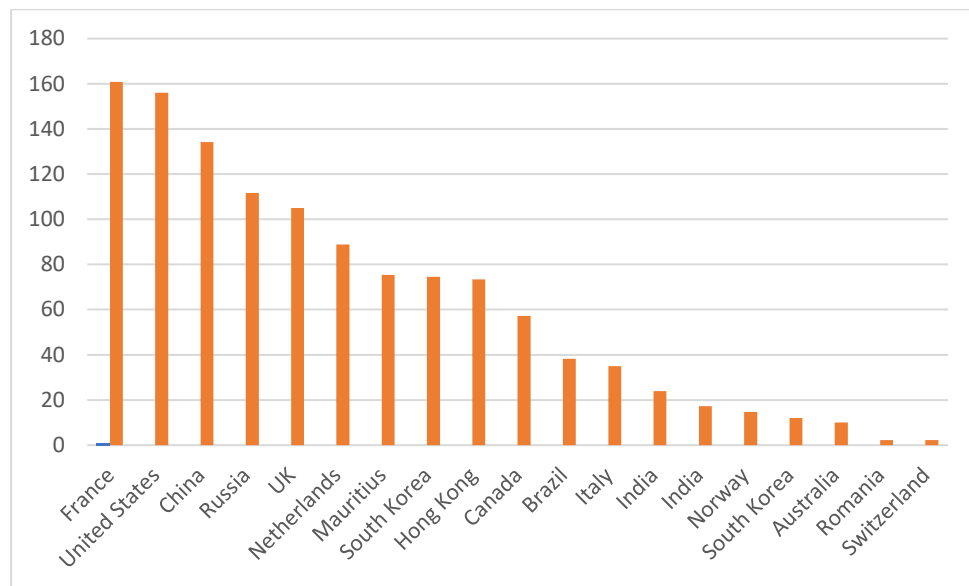


Figure 3: FDI inflow and Oil and Gas FDI inflow into Nigeria



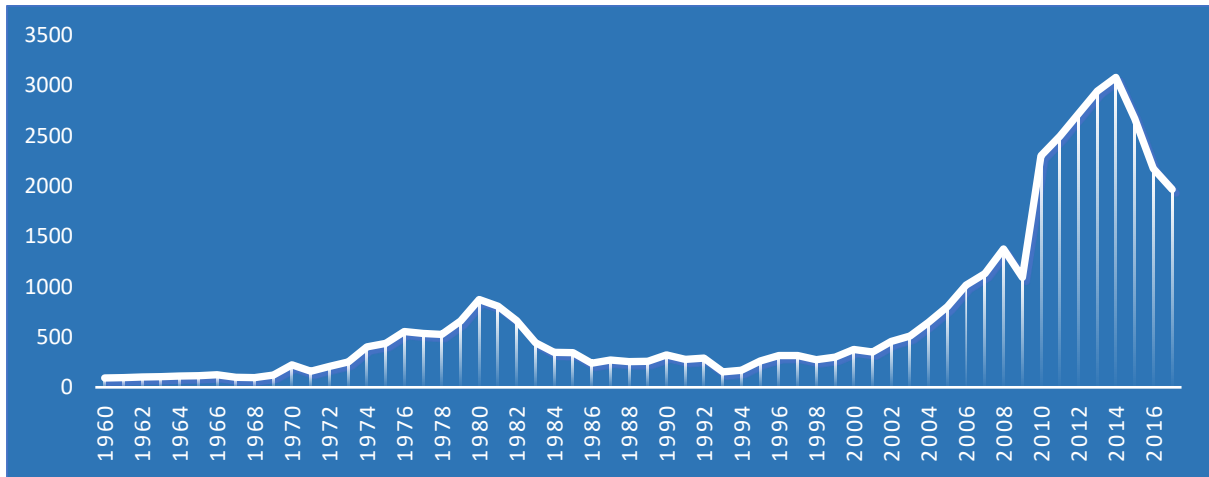
Source: fDiMarket, FT and UNCTAD

Figure 4: Source Countries of OGFDI into Nigeria, 2017



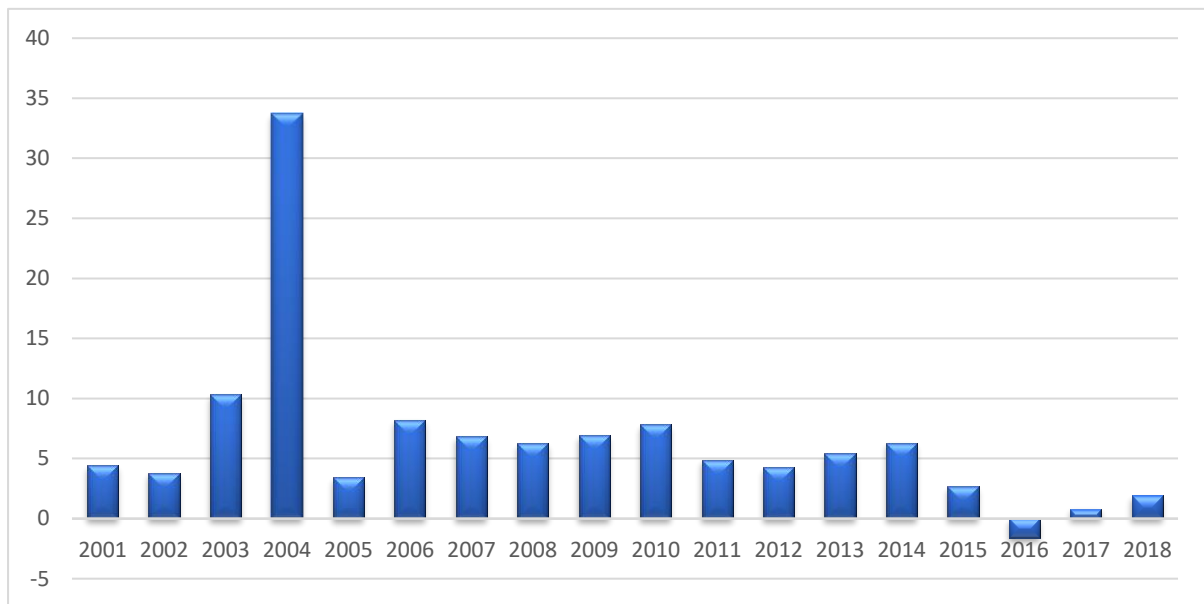
Source: fDiMarket, FT and UNCTAD.

Figure 5: GDP per capita (current US\$)



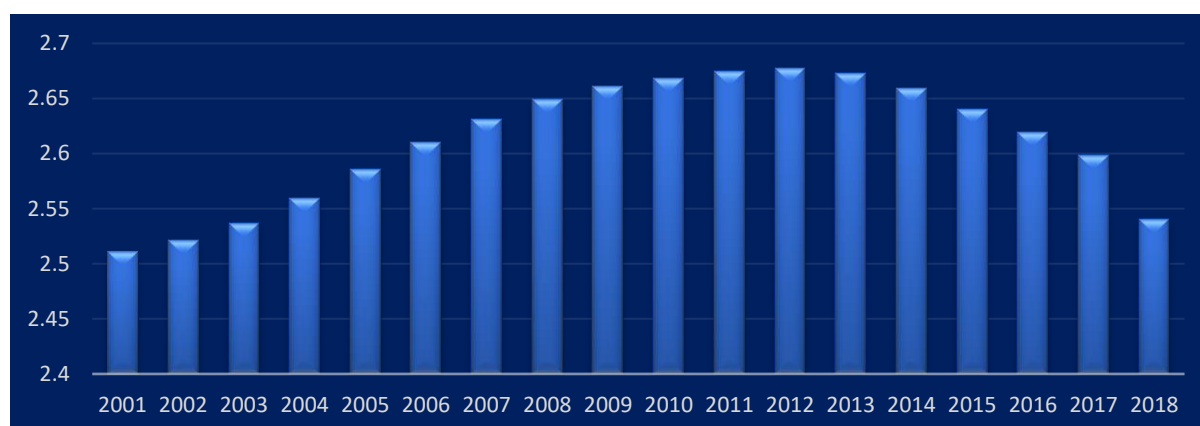
Source: World Bank

Figure 6: GDP growth (annual %)



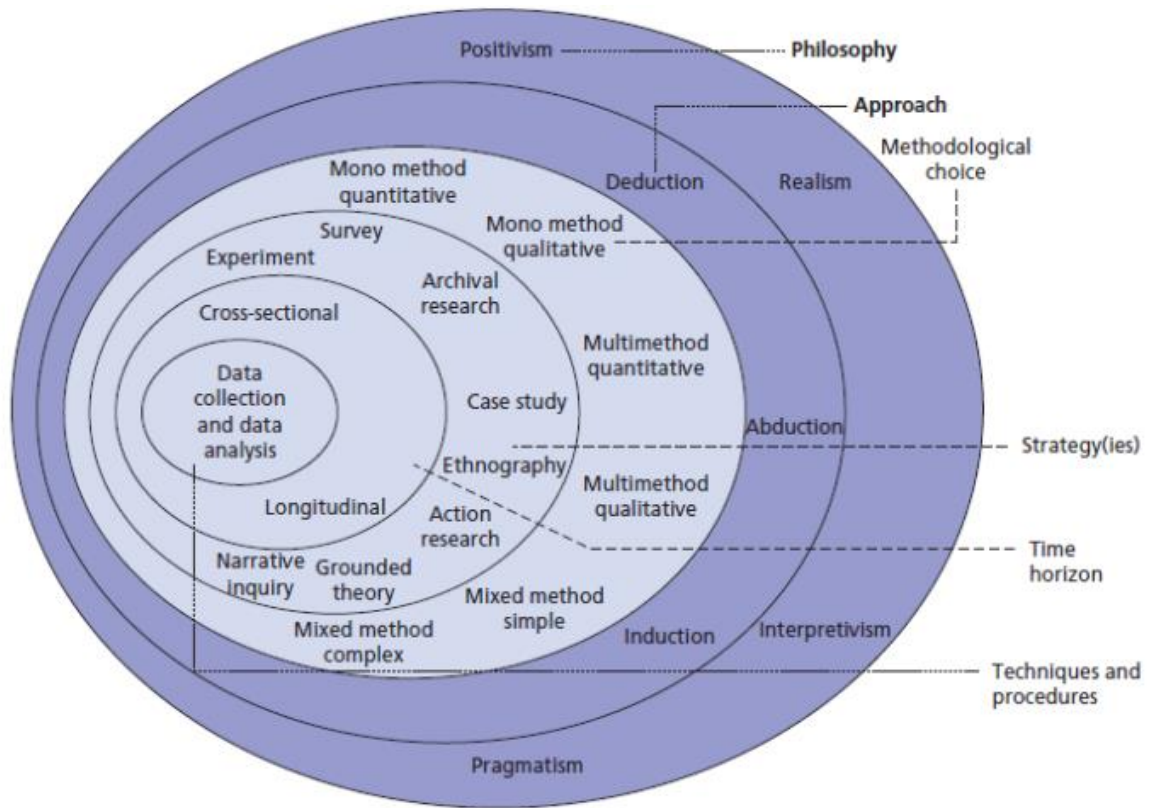
Source: World Bank

Figure 7: Population growth (annual %)



Source: World Bank

Figure 8: Research philosophy (Research Onion)



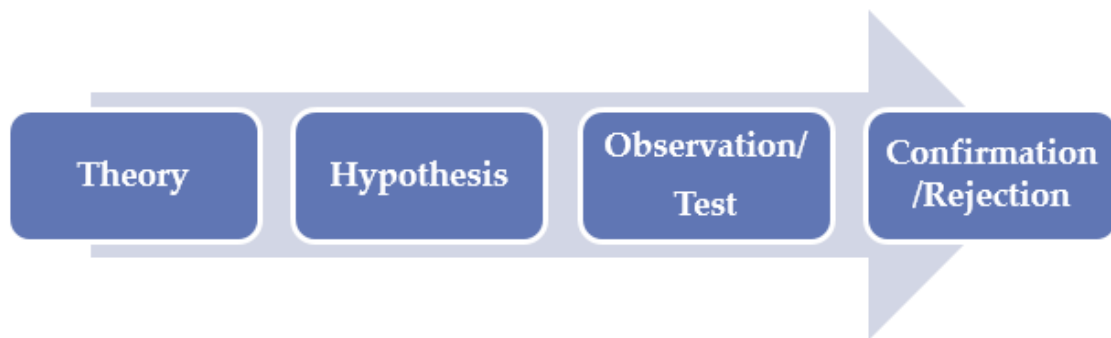
(Saunders,2012)

Figure 9: Research Paradigm



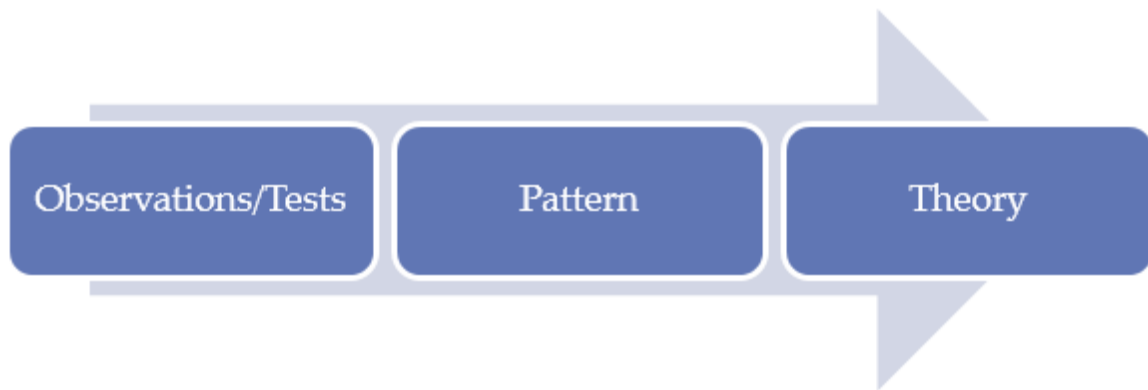
(Blaikie,2010;Bryman,2012;Saunders and Thornhill, 2012)

Figure 10: Deductive Approach



(Dudovskiy,2014)

Figure 11: Inductive Research



(Dudovskiy, 2014)

Appendix 1

Descriptive Statistics Before Log Transformation

	N	Minimum	Maximum	Mean	Std. Deviation
GDPpc	306	0.00003	18052.4024	47.817	59.89
LabourForce	306	0.00054	3095.0905	53.58	30.97
FuelExport	306	0.0001465	69196.3146	177.097	64.68
Trade	306	0.00398	1697.1728	276.076	25.32
RuleofLaw	306	0.0057574	89.34187	8.693	43.49
mobileSub	306	0.0037827	7898.77721	80.955	27.43
ExRate	306	0.00322	29.3813	3.908	56.15
Interest Rate	306	0.00007	60.1276	9.161	31.17
FDI	306	0.005358	20562.75	1257.676	36.27
Tech	306	-0.30255	24.5026	20.923	65.56

Appendix 2

Descriptive Statistics After Log Transformation

	N	Minimum	Maximum	Mean	Std. Deviation
InGDPpc	306	0.20099	6.18519	0.5174264	0.90928863
InLabourForce	306	0.44821	10.33817	4.2913284	2.25778803
InFuelExport	306	1.08402	8.66593	5.1389131	1.62413201
InTrade	306	0.54322	5.07473	2.6582822	0.94609233
InRuleofLaw	306	1.02786	7.57362	2.6900536	1.28762767
InmobileSub	306	1.08402	14.29373	4.7008875	1.7627063
InExRate	306	0.4479	4.86057	1.1152762	0.90200675
InIntRate	306	0.43509	13.49658	2.9216538	2.58357677
InFDI	306	0.26095	6.35844	0.8475432	0.95349894
Tech	306	0.6442	5.28662	2.1858161	0.73217821